

THE ACADEMY.

"INTER SILVAS ACADEMI QUÆRERE VERUM."

Vol. III.—No. 54.

Readers are reminded that the mention of New Books, Articles, &c., in our lists is intended as a guarantee of their importance. The Editor of THE ACADEMY cannot undertake to return communications which are not asked for.

The Editor cannot reply to questions from authors respecting the notice of their books.

The next number will be published on Monday, September 2, and Advertisements should be sent in by August 28.

General Literature.

RECENT WORKS ON VOLTAIRE.

Voltaire et la Société française au XVIII^e Siècle. Voltaire et Frédéric. Par Gustave Desnoiresterres. Paris: Didier, 1870.

Six Lectures on Voltaire. [Voltaire. Sechs Vorträge. Von David Friedrich Strauss.] Leipzig: Hirzel, 1870.

Voltaire. By John Morley. Chapman and Hall, 1872.

To write the history of Voltaire is to write the history of his century. His influence told so deeply upon generally received habits of thought, and touched points so vital to the common beliefs of men, that his power was felt not only throughout the varied sections of the community of which he was a member, but availed to modify the existing conditions of European society. Materials lie about us in plenty, and there has been no lack of labourers in the field. They form a long list of names, which begins with Duvernet, and ends with Gustave Desnoiresterres, who in his valuable work, the fourth part of which has now appeared, fulfils all the most exacting requirements of modern science. For once the French man of letters has exchanged rôles with the German, and whilst M. Desnoiresterres takes upon himself the burden of arduous research, Dr. Strauss gives us an elegant abridgment of his labours. But then the subject is after all a countryman. Mr. Morley's position is totally distinct from both: he does not propose to rival M. Desnoiresterres by writing an exhaustive history of Voltaire, nor following the example of Dr. Strauss, to lay at the feet of an intelligent princess a finished and elegant memoir. Mr. Morley prefers to comment for us the essential points in his character, the critical moments of his life, just those facts in short which are significant to us of the nature and influence of this extraordinary existence.

It was in 1867 that M. Desnoiresterres gave us in his *Jeunesse de Voltaire* the first instalment of this biography. The appearance of each successive volume has called forth fresh testimony to the intrinsic merits of the work. The author has suffered no source of information, however remote, to escape his search, and he has applied to the treatment of the multifarious quantity of materials which he has assembled a cultivated intelligence and literary skill. The style is simple, the language at times even more than appropriate, and the grouping is managed with so much judgment as to effect that we are placed in possession of every possible detail without being oppressed by the sense of overcrowding. Chronology is one of the points on which M. Desnoiresterres has been obliged to bestow much attention. Voltaire himself was notoriously careless about dates, and his secretaries, Longchamp especially, seem to have followed

VOL. III.—NO. 54.

their master's example in this matter. The very date of his birth (November 21, 1694) was first placed beyond dispute by his latest biographer. And M. Desnoiresterres has not only brought into order the earlier years (which seemed in confusion past hope of disentanglement), but with unremitting care has verified every succeeding date, so that as far as he has gone we are now in possession of a thoroughly reliable chronology.

There is also another question which has inspired the curiosity and taxed the ingenuity of all who have approached the subject, viz. how did Voltaire obtain the princely fortune in the enjoyment of which he spent the last years of his life? To this ever recurring question no one as yet has succeeded in finding a satisfactory answer. If M. Desnoiresterres has not wholly explained away the mystery, he has at any rate indicated to us the direction in which we must look for explanation. The earlier biographers, like Duvernet, are all satisfied to remark that the gifts of the Regent, and the profits of *Oedipe*, placed him above requiring the aid of his family. But in his first volume, M. Desnoiresterres pointed out that the forty-five representations of *Oedipe* did not commence till November 18, 1718, when Voltaire was nearly twenty-five, and the gifts of the regent were bestowed at about the same date. It was on December 6, 1718, after his liberation from the Bastille, that he received from the duke of Orleans the gold medal and pension of twelve hundred francs. The papers of his father, too, contained proof that he was occasionally called on for supplies. The author quotes from the inventory taken at the death of M. Arouet, "Liasse 70, quittances relatives aux sommes accordées à son fils pour ses pensions depuis qu'il est sorti du collège." But M. Arouet did not, we may be sure, furnish his son with enough to support the expenses of a life which that son himself describes as a career of wild dissipation, carried on in the best society of Paris. Now and again Voltaire talks of money-lenders, and leads us to suppose that he passed his life in constant embarrassment. It is therefore with the utmost astonishment that we discover that in January 1722, at the death of M. Arouet, his son was already in possession of a small capital. Besides three "actions de la Compagnie des Indes," Voltaire had amassed about 5000 francs, which he had placed in the hands of his father, and this, too, at a time when he had only been three years in receipt of the regent's pension. So that throughout the years which he represents as passing in a career of reckless extravagance Voltaire was privately saving. Reckless extravagance laid the foundations of future fortune, just as idle dissipation produced *Oedipe*, *Artémise*, and *Henri IV*. Dr. Strauss in his preface quotes Goethe's remark that, just as now and again we see in old families that nature will bring forth an individual who unites in himself all the qualities of his ancestors, and shows in full perfection those peculiarities the existence of which in the race have hitherto been but indicated, so we sometimes see the virtues and vices of a great nation brought to a focus in one typical man. Thus in Louis XIV. there arose the typical king of France, and even so in Voltaire the nation found its typical writer. "Ne m'offusquez pas, car je veux paraître," said Henri IV. This "besoin de paraître," a distinct national peculiarity, was necessarily represented in Voltaire. "On a les défauts de ses qualités." This inborn necessity for striking an attitude explains away many of the at first sight contradictory tendencies which bewilder the student of his character. Voltaire's first impressions of cultivated life, as distinct from that of the middle-class, were received in the "société du Temple." Wit and dissipation seemed indissoluble companions. Voltaire's vanity was interested in assuming the outside of a fine gentleman. To parade the

airs of fashion and quality in the eyes of Paris was to increase his credit as an author, but he was too clear-sighted not to perceive that neither solid fortune nor reputation were thus to be achieved. Therefore, just as he studied and laboured in long intervals between revels which afforded him probably just that stimulus which was necessary to brace his nerves to willing work, so he strove at the same time to create for himself an income which should make him independent. But when he has to depict the situation, he has recourse to appropriate "décors du théâtre," to the heightening touch "qui fera bien dans le paysage." Mr. Morley thinks that "substantially Voltaire's transactions were very like those of any banker or merchant of the day." But M. Desnoiresterres, perhaps an even too impartial biographer, more than suspects the legitimacy of these dealings. Voltaire was sometimes unpleasantly canny in his choice of means to an end, and it is difficult to believe that his money transactions were governed by a loyalty which seems often to have been absent where his own advantage was concerned. He had access early not only to the salons of the great, but to those of the financial world, the attention of which had been drawn to him by his ode on the *Tribunal de Justice*, which had marked him out as one whose pen it might be worth while to conciliate; and his early training in Maître Alain's studio had put him in possession of a kind of knowledge valuable both for the getting and keeping of money. If, however, there is absence of proof as to how the first small beginnings were made, it is now clear that skilful operations in the lottery of the "Ville de Paris" first put him in possession of considerable fortune, and from what we know of that transaction, and from his speculations in corn under the assumed name of Demoulin, in the rue de Long Pont, and again in provisioning the army of Italy, from all of which he derived enormous profits, we are justified in concluding that in the absence of any direct source of income, money was obtained wherever it could be got, without overscrupulousness as to means. There is nothing in such conduct incompatible with the rest of the character, nor at variance with the quality of that particular type of which he is the most brilliant example. He himself says that, goaded by the humiliations which had to be borne by the poor man of letters, he resolved to shield himself from them by the acquisition of a great fortune. This he did to spend, and not to keep. "Assez de gens méprisent le bien," says La Rochefoucauld, "mais peu savent le donner." Voltaire was one of these few, and as a rule practised, as Mr. Morley reminds us, the virtue of magnificent expenditure.

On this point, and indeed on every other, Mr. Morley may be read with advantage as a commentary on the store of facts which M. Desnoiresterres has brought into order for us. Mr. Morley brings not only just judgment but sympathetic insight to his reading of the essential features of the great French genius. He seizes the clue which alone can guide us through the apparent perplexities and strange involutions of Voltaire's character. Instead of vainly trying to credit him with the more correct, ordinary, and pedantic virtues, he is everywhere found insisting on the intense generosity and sensitiveness of the man. People like Marmontel complained that he gave too ready countenance to worthless admirers and flatterers. This, Mr. Morley truly says, "had a source in his intense and sympathetic quality, and was an eager asking assurance from others that his work gave pleasure. The exact steady value to Voltaire of his sojourn in England is seized: "he left a country where free-thought was an empty watchword, and found a land where men, if they had rejected Christianity, had at least thrown themselves with grave faith on the disciplined intelligence

and its lessons." And again, "so real a mind would exchange with delight the poetised astronomy of Fontenelle for the sure and scientific discoveries of Newton." In regard to M^{me} du Châtelet and her relation to Voltaire, much is said marked by the same quality of just and intelligent perception. But Mr. Morley hardly seems to indicate with sufficient force the existence in her of that depth of warmth and passion, coupled with the power to bestow "imperial sympathy," which was first indeed revealed to us in the unpublished letters furnished by M. Feuillet de Conches to M. Desnoiresterres for his third volume, *Voltaire à la Cour*. Yet without this touch our conception of her must be incomplete. It is precisely this craving for heart affection which made her life with a man like Voltaire "extremely hard for her." In 1749 the tie came to an end, and Voltaire was "disastrously free." The Berlin court, but especially the French colony at the Berlin court, is admirably drawn by M. Desnoiresterres. It is a picture which cannot be regarded with satisfaction; to one of its most unpleasant passages—the Hirschel affair—he has given patient investigation. A lithograph of the original bill of the jewels left with Voltaire by the Jew is given, and an examination of this will suffice to convince any unprejudiced eye that the worst part of the accusation against Voltaire—viz. that of tampering with the document—is undoubtedly false. "There is," says Mr. Morley, "no more pitiful leaf in the biographies of the great than Voltaire's quarrels with ignoble creatures, names which recall vulgar, dishonest pertinacity on the one side, and wasteful, undignified fury on the other."

Perhaps the chapter of Mr. Morley's *Voltaire* which deserves to be read with most attention is that headed "Religion." Here the relation and influence of Voltaire on religion and religious opinion will be found discussed for once from the standpoint of calm intellectual enquiry. The author dispassionately points out Voltaire's failure to rise to the highest points involved in the great debate, and how this invalidated all that he wrote on religion; how he missed the emotion of holiness, the soul and life of the words of Christ and St. Paul; how he had no ear for the finer vibrations of the spiritual voice. But Mr. Morley also recalls to mind that Voltaire lived when, as he himself said, "Here Calas is broken on the wheel, there Sirven condemned to be hung, further on a gag thrust into the mouth of a lieutenant-general, a fortnight after five youths condemned to the flames. Is this the country of philosophy and pleasure?" "We must never forget," says Dr. Strauss, "that it was the furies of St. Bartholomew, of the dragonnades, and of the crusade against the Albigenses, which turned their torches in the hands of Voltaire against Christendom. 'He who says, think as I do or God will punish you, will soon say, think as I do or I'll make you.' Has this saying lost any of its fearful truth because it is a hundred years since Voltaire wrote it down?"

E. F. S. PATTISON.

The Elegies of Propertius, translated into English Verse by Charles Robert Moore, M.A., late Scholar of Corpus Christi College, Oxford. Rivingtons, 1870.

MR. MOORE in his short preface apologizes for the attempt which he has here made to introduce Propertius to English readers. This he need not have done; except Catullus, none of the Roman poets is more real as a lover than Propertius; and no erotic poet, either Greek or Roman, has spoken in tones more complex and elaborate. As a study of language as well as metre these elegies cannot fail to be interesting, even if on moral grounds they have sometimes been considered, as by the late Dr. Arnold, dangerous reading for boys.

The translation is for the most part in heroic couplets; but once or twice this rule is broken, e.g. v. 8, *Disce quid Esquilias*, where short lines in the style of Conington's *Virgil*, and v. 11, *Desine Paulle*, where elegiac stanzas of four lines are used instead. The former of these exceptions can hardly be considered happy; the latter might, we think, be worked into something better. And this may be said of the translation as a whole. Considerable as Mr. Moore's success may be allowed to be, there are very few pages which would not be improved by an extra year's careful retouching. The faults indeed lie on the surface, and are the faults of immaturity: e.g. 's for *is*, *I'll* for *I will*, *I'm* for *I am*; or grammatical inaccuracies: e.g. *Like she* for *Like her*, *had broke* for *had broken*; or bad rhyme, like *war, before; borne, dawn*. There is besides this much laxity in proper names; Mys appears as Myos, Myron as Myro; the familiar neuter *hippomanes* is transformed to a female Hippomane; the modern Tivoli figures side by side with Praeneste, Bevagna (Mevania) by Clitumnus, Alba by Nemi, p. 105; and *Dorica castra* is translated "Doria's chivalry," an expression which recalls Genoa and the great Genoese admiral rather than Troy and the Greeks encamped before it.

The following is a fair specimen of the translation, iv. 4, 7:—

"Now, school'd in warfare, spread the canvas wide,
Lead forth the coursers, knights, in all their pride;
Go, Fortune smiles, avenge the slain, and be
One more bright page in Roman history.
Great Mars and Vesta's fateful fire, I pray,
Grant I may live to see that happy day
When Caesar's laden chariot sweeps along,
The steeds half fretting at th' applauding throng."

The four lines iv. 6, 30 *sqq.* are well translated thus—

"If tale so sad my Cynthia wept indeed,
Run back the way thou camest, run with speed;
Weep, and be this the burden of thy song—
Wrath she may get from me, but never wrong."

The distich, ii. 18, 29, 30, is simply and effectively rendered—

"But thou wilt come adorn'd enough for me
If thou but come as often as may be."

On the whole, though marred by imperfections, this translation is not, as the author fears, a failure, and with more elaboration might be made a success. R. ELLIS.

Correspondence and Conversations of Alexis de Tocqueville with Nassau William Senior. Edited by M. C. M. Simpson. King and Co.

THE proper subject of this work has been intrenched upon by two earlier publications; the *Life and Correspondence of de Tocqueville* would have been incomplete without at least some of the letters of his oldest English friend, and it was impossible to omit from Mr. Senior's *Journals in France and Italy* all mention of his most able informant and most constant companion. On the other hand, the letters and conversations now collected have the appearance of a united and continuous whole, which cannot be said of a mixed correspondence or a miscellaneous journal, and in this case the whole is sufficiently valuable in itself, as well as sufficiently characteristic of its joint authors, to excuse the unavoidable repetitions of some interesting passages. To contemporaries Mr. Senior's note-books have all the interest of gossip, and we are content, as in real conversation, to run the risk of now and then hearing the same thing twice over; but posterity may be less indulgent, and the journals have a right to look forward to its judgment, because of the solid kernel of instructive information which they offer, not so much to the historian proper as to the historian of society and of opinion. For this reason we should be glad to think that the present

arrangement is not final, and that when the volumes which now overlap have had their short day of success with the general reader, they will be succeeded by a complete and methodical edition of everything that the indefatigable author thought worth preserving. Voluminous and even tedious as the collection might seem, it is the best way of doing justice to Mr. Senior's peculiar gift, for no editor, however well informed, can hope to divine correctly which trivial fact, which careless prognostication will become luminous half a century hence, while yet it is a pious duty to see that no such chance is lost.

In some ways the volumes before us show better than their predecessors the precise nature of Mr. Senior's services to historical truth. In one letter he expresses a hope that de Tocqueville will not find him "an unfaithful Boswell," and if he had really stood in that humble and useful relation to any one, it would perhaps have been to the author of *Democracy in America*. But when we compare these notes with the records of his conversations with other celebrities of all sorts and sizes, we see how little his painstaking curiosity was dependent on the stimulus of admiration for the views expressed. His interest, and therefore ours, is much more general. The chief value of the correspondence with even this intimate friend is not biographical or personal; it might, with perfect propriety, be called "The Opinions of a Conservative Liberal in England and France from 1835 to 1859," and neither its usefulness nor its literary attractiveness would be in the least impaired by the change. A Boswell undertakes his task either because he admires every individual utterance of his hero so much that he wishes none may be lost, or because on general grounds his admiration for the man is so high that he assumes whatever he says is valuable merely because he says it. It need scarcely be said that Mr. Senior's attitude to his examinees was very different from either of these. His own view of the matter appears in the following passage from a letter to Archbishop Whately:—"You must recollect that in all these conversations my object is to record what my companions said, not what I said myself. My own words are introduced as sparingly as possible, merely to render intelligible what was said to me. My journals are therefore full of most extravagant opinions and statements, unopposed, indeed uncomplemented on, by me—but certainly no more acquiesced in than what is reflected by a mirror is acquiesced in by the man who holds it." But the man who holds the mirror chooses the objects that shall be reflected in it, and is alone responsible for the choice; Mr. Senior's originality lay in the manner in which he exercised it. Like a locomotive, permanent commission of enquiry, he took the evidence of any one who liked to offer it, but the persons he was at most pains to interrogate were—not those who could most easily turn their opinion into action, or whose opinion was of most speculative weight—but the representatives of an intellectual type, the men who make an opinion important by holding it, because they are certain not to hold it alone. Thus many of the remarks he has preserved are perfectly commonplace, and such as must have been made over and over again in dozens of newspapers; true or false, the historian of opinion would not think of discussing them on their own merits; but coming from the mouth of this or that distinguished public character, they are a part of the social and political forces actually existing, and it was the number and kind of these forces which Mr. Senior seems to have made it the business of his life to examine and appreciate. His task was the easier because he had no wish to shine himself, and was quite careless about convincing his companions; sometimes he seems almost to play the part of an animated "man of straw," making just the

most obvious answers to objections so as to keep the discussion alive without really influencing its course. Even on points about which he felt strongly he was never carried away by the spirit of debate so as to press his own advantage or expose his opponent's inconsistency. In return for this self-denial, he only asked his friends to let him help them to talk their best, and it is not strange that few were churlish enough to deny the modest request.

Unlike most political memoirs, his note-book is least interesting where it deals with historical luminaries of the first magnitude. As de Tocqueville warned him, such personages, when aware of his habit of reporting conversations, were careful only to say what would look well when written down, and though the lapse of time may make it interesting to know what, for instance, Thiers wished to be thought to think about French politics in 1854, what de Tocqueville and Ampère really did think is of more importance, because their influence was a constant and positive fact, which in the long run would outweigh any single diplomatic manoeuvre. Of course the question of paramount interest throughout these two volumes is that of the political future of France; even to English readers questions of domestic policy, like the new Poor Law or the Reform Bill, seem tame by comparison. And notwithstanding all that has been written to explain the possibility and the success of the Second Empire, there is still something to be learned from Mr. Senior's mirror, as it reflects the successive hopes and fears of men honest, intelligent, and even brave, yet perfectly incapable of providing a remedy against the evils they foresaw. De Tocqueville and his friends could calculate within a few weeks when the next *journée* in the streets might be expected; they had been talking familiarly of the *coup d'état* for months before it came; conditional prophecies of remarkable acuteness are too plentiful to be enumerated, and yet, when the day of danger came, these men, the best representatives of aristocracy in France, could do nothing for either themselves or their country but cry, "A Mazas," and once in durance, their chief feeling was one of relief that "the struggle was over" without fault of theirs. Manzoni gave as a reason for avoiding politics that he was "incapable of distinguishing between the desirable and the possible." De Tocqueville's weakness as a politician seems to have arisen from an over-anxiety to avoid that common snare of inexperienced statesmen; and in practice he carried caution so far as to amount to recklessness. In July 1851 he wrote, "The government which I should prefer, if I thought it possible, would be a republic; but believing its continuance impossible" he was content to trust partly to Louis Napoleon's incapacity, partly to his moderation to mitigate or abridge the despotism which he saw no means of resisting or averting.

The *Droit au travail*, second in importance of the subjects which recur in the correspondence, is treated in very much the same spirit. In his letters to Senior, he dwells on the fact that a poor law on the English model, "affording relief on terms less acceptable than wages," would not satisfy the hopes excited by the extensive socialist agitation. But whatever the faults of the English Poor Law, its use as a barrier against socialism depends on the peculiarity—much open to abuse—that a resolute pauper has the law on his side if he insists on spending his life in the workhouse. But in the speech which characterized socialism as "un appel énergique, continu, immodéré aux passions matérielles de l'homme," he argued at length against admitting the right of the poor to either work or relief, and insisted that the state should only organize "Christian charity." The most severely unpopular measure that an *Anglomane* political economist could invent would have been practical as com-

pared with such a suggestion, and such a suggestion made in May 1848 was little better than a mockery, as no one knew better than de Tocqueville when it was his turn to think instead of to act.

The difficulty of foretelling the course of history is very completely illustrated by the guesses as to the probable duration of the empire which were commonly made during its earlier years. M. Beaumont said, "I should give him fifteen years if I thought him capable of using the immense advantages of his position." Most of the other prognostications had a condition attached, and the prophets were generally right as to the different alternatives that were possible; only their calculations were apt to be disarranged by the one incalculable element, the personal character of the usurper. At other times a plausible conjecture turns out incorrect because one of the many influences that could affect the result was forgotten. There is an instance of this in the second volume:—"The corruption that infects the civil service must in time extend to the army, and make it less fit for service." "Of course it must," answered Tocqueville. "It will extend still sooner to the navy. The *matériel* of a force is more easily injured by jobbing than the *personnel*. And in the navy the *matériel* is the principal." Recent changes in the art of war have raised the importance of the *matériel* in the army, and the *personnel* escapes corruption best which is furthest removed from its seat. On the page before, we read, "No corruption that ever prevailed in the worst periods of Louis XV., nothing that was done by La Pompadour or the Du Barry resembles what is going on now," i.e. May 1853, for the date of these general statements is the most instructive part of them. This was the time when men's consciences were finding their price, and scandal of all sorts was so rife in society that de Tocqueville thought the reign of *friponnerie* could not last much longer; but by 1857 things had found their level: Paris was peaceable, and, for the first time for many years, Paris was dull; the Bourse was the one excitement, extravagance the one employment. When the price for which men's consciences had been sold was all spent, scandal revived, and the virtuous indignation of *La Lanterne* had all the effect de Tocqueville anticipated.

The conversations are not all political; those of a miscellaneous nature are worth reading, though not perhaps worth quoting. A good story is told of Nicholas and Lamoricière, who had been sent to praise the republic to him in 1848. The czar replied, "My good friend, there was no need to tell me all this: I have not the least wish to interfere with you. Whether you have a republic, or a dictator, or an emperor, I do not care a rouble. The only government that I cannot tolerate is a constitutional monarchy, and in your case I see no immediate danger of that." It is not quite evident upon what principle some of the speakers in the journal appear only under initials, as they are for the most part identifiable with persons elsewhere mentioned by name. Another superfluous precaution is that of giving the original of de Tocqueville's comments on Mr. Senior's memoranda; the translation, which is quite trustworthy and idiomatic, would have been enough for them as well as for the letters. But these are trifling details: in the main, the editor has done enough, and not too much, to what under any circumstances must have been an interesting publication.

H. LAWRENNY.

LITERARY NOTES.

The 1207th volume of the Tauchnitz Collection of British Authors consists of selections from Shelley, preceded by a graceful and sympathetic essay by Miss M. Blind, which originally

appeared in the *Westminster Review*. Shelley has never met with anything like adequate recognition from the general public, and consequently he is the only one of the great group of poets of the beginning of this century, of whom it cannot be said that a trustworthy traditional estimate exists. In default of criticism Miss Blind presents the tradition of his admirers in its most intelligent form, perhaps her admiration of *Julian and Maddalo* is exaggerated; if it was inevitable to sacrifice something, we may still be permitted to regret that, while *Julian and Maddalo* is given entire, we have only the exordium to *Alastor*, and that such copious extracts are given from the *Revolt of Islam* as to leave no room for more than two acts of *Prometheus Unbound*. Though we think Miss Blind overrates the *Revolt of Islam*, there is undoubtedly, in the case of a poet like Shelley, in whom the constructive faculty was almost always completely overshadowed by the prodigious development of other and higher faculties, a good deal to be said for the principle of giving extracts from a larger number of poems rather than a smaller number uncurtailed.

In the *Cornhill* some translations from an Arab poet of the twelfth century, Abu'l Fadhl Zoheir (b. 1186 A.D.) are remarkable for their very modern tone: the artificial polish which is characteristic of Arabian poetry in general makes way in his *vers de société* for comparative simplicity of language, and the fancifulness of his imagery is not much more strained than that of the Caroline poets.

In reviewing a French translation of Horace Walpole's letters in the *Revue des deux Mondes*, M. Caro brings out the ineffaceable influence of national idiosyncrasy in writings that would at first sight seem most free from it. Walpole's letters are almost the English equivalent of Madame de Sévigné's, the great object of his admiration, and yet, when reproduced in French, they constantly strike a cultivated reader as "Britannic" in animation and humour.

Prof. Gnoli, who is charged by the city of Rome with the task of marking the houses of memorable visitors with a tablet bearing their name, describes in *Im Neuen Reich* (July 19) the inductive process by which he identified the site of the house occupied by Goethe in 1786, but as the house itself has been almost entirely rebuilt since then, his ingenuity seems to have been somewhat wasted; but the German pilgrims to the Eternal City may be of a different opinion.

Music, Drama, and Painting.

The Works of Couperin. [*Denkmäler der Tonkunst. Werke von Couperin*; herausgegeben von Johannes Brahms. Erster Band: Clavierstücke, erstes und zweites Buch.] Bergedorf bei Hamburg: H. Weissenborn, 1871.

FAMILY likeness has been perhaps as often and as strikingly exemplified in a talent for music as in any other speciality of mind or body. With some of the greatest names in musical history more than one person, indeed many persons, of great ability are associated. The sons of Palestrina have been lost to posterity in the shadow of their father's greatness; yet all three, even the two who died young, were regarded with favour by their contemporaries. The brothers Anerio are in their works, and possibly in their persons, continually mistaken for one another, or supposed to be identical. Three generations have augmented, not, however, in an increasing ratio, the renown of the Scarlattis. Henry Purcell was not the only musician of his family; and William and Henry Lawes are rarely mentioned separately. The individuality of the elder Mozart would seem to have merged in that of his son, who by this time might have been as completely forgotten as any other of the juvenile prodigies who have succeeded him, had he not found in his father a teacher whose patience, discretion, and disinterestedness approached, if they did not attain to, the quality of genius. The excellent musicians who have borne the name of Bach, if not innumerable, have never been numbered. Even those

who attained reputations only inferior to that of John Sebastian form a considerable list. So with the name Couperin, which represents a family so remarkable that the author of the pieces which form the volume named at the head of this paper was distinguished from his father, uncles, aunts, daughters, nephews, and nieces as "le grand Couperin." The volume itself—an evidence alike of the catholic taste and industry of one of the greatest of living composers—is a very precious contribution to the archives of music; not merely interesting—though this is much—in so far as it marks the condition of a particular kind of art at a particular time, but as a collection of music, whenever and by whomsoever composed, at once beautiful and individual. It includes the first and second "livres," and therefore not all, of the "*Pièces de Clavecin*" published by their author in the years 1713 and 1716-17. Of these original publications—magnificent folios printed from copper-plates—copies, never very numerous, have now become rare and costly. Single pieces and even small collections of them have recently been edited by English musicians, the first of whom, I believe, was Mr. Lindsay Sloper. Before this, Couperin, save to the curious few, would seem to have been, during the present century, little more than a name, even among his own countrymen. Clementi's *Practical Harmony*, still the best collection of the clavier music of the last century, contains no specimen of his compositions; nor indeed, with the exception of an "*Allemande*" in Hawkins' *History of Music* (vol. v. p. 48), have I met with one in any work, German, French, or English, of more than ten years' standing.

The clavecin music of "le grand Couperin," of which the volume edited by Herr Brahms exclusively consists—practicable, it need hardly be said, on the clavecin of to-day, the pianoforte—is of two distinct kinds: dances, or more properly pieces, however developed, sufficiently marked in their rhythm to be danced to—gigues, minuets, gavottes, sarabandes, and the like; and what may be described by the modern familiar title, "songs without words." In the first of these forms, Couperin, relatively not merely to his contemporaries but even his immediate successors, is one of the most ingenious and pleasing of composers. He was the predecessor by nearly twenty years of Händel and J. S. Bach, and already a renowned composer and clavecinist when those great masters were practising their scales. Nevertheless not a few of his pieces in this first kind will easily bear comparison with all but the best of theirs. In the second kind, he has stood till very recently quite unrivalled. No doubt music suggested by some circumstance or thing, or rather the sentiment awakened by its consideration, had been attempted by French composers anterior to, and certainly known to, Couperin. None of these, however, not even Denis Gautier's *Tombeau de Mad^{lle} de L'Enclos*, has lived to impugn Couperin's originality. Nor, till very recently, have instrumental composers attempted to follow up the route in which Couperin, if he did not first enter it, made such way. For the volume before us consists in great part of these "songs without words," the variety in the titles of which perhaps exceeds that in the music to which they are prefixed. Couperin, like greater masters, occasionally repeats himself; or perhaps it would be fairer to say that many of his pieces are, or seem to us, very much alike. This arises partly from their brevity and simplicity in form; partly from the little variety of key employed in his age, though in this respect he is in advance of it; and, more than all, from his very frequent employment of the minor mode—the last trace of an unwillingness to accept our "natural scale," but the old masters' "*modo lascivo*." But Couperin's facility in the invention of titles is marvellous. Here are a few which follow in immediate succession: *Les Sylvaings*, *Les Abeilles*,

La Nanette, Les Sentiments, La Pastorelle, Les Nonnêtes (sic)—première partie, *Les Blondes*, seconde, *Les Brunes*. The connection of these titles with the particular music which follows them is not always very obvious; as, indeed, is the case with a good deal of the music of our own time. A marked character is given to *Les Sylvains* by its limitation to the compass of the male voice, and in like manner to *Les Abeilles* by its "medium" pitch, tranquil motion, and limited range of notes. Couperin had certainly seen the bees

"murmur by the hour in fox-glove bells."

But how *Nanette* differs from other young ladies, or what particular "sentiments" are suggested by the fourth piece in my list, are likely to remain puzzles "till time" and tune "shall be no more." *La Pastorelle* always makes herself known and understood without difficulty; but *Les Blondes* and *Les Brunes*? How does my reader suppose they make themselves distinguishable? Both utter the same strain, but the former in the minor, the latter in the major mode! Now I assert, with little fear of contradiction, that nine modern musicians out of ten would have reversed this arrangement; would have felt the minor mode, with its average reticence and occasional volubility, the persistent sadness of its lower tetrachord, and the three varieties of its upper, to be more characteristic of the brunette than of the blonde, whose evenness of temper and clearness of thought would seem to find their juster expression in the natural scale. The choice, however, lets us a little into the composer's tastes and likings. Certain it is, if anything certain about a man is to be gathered from his works, that Couperin, like his contemporaries, preferred the minor to the major mode. We are driven, then, inevitably to one of two conclusions: either that Madame Couperin was a blonde, or that Monsieur Couperin wished she had been. Having settled the domestic relations of the composer, to our own satisfaction at least, let us return to his music.

Couperin has many moods, but his prevailing mood is tenderness. In the volume before us the student will find many pieces characterized by strength, but many more characterized by sweetness. The composer has himself distinguished these in almost all instances by their titles. Thus the volume opens with a stately "Allemande," which he has well named *L'Auguste*. This is shortly followed by an equally stately "Sarabande," headed, *La Majestueuse*. Farther on, among the pieces of the "dixième ordre," we find an extended "battle piece," in which may be found a good many of the effects introduced a century afterwards by Kotzwara, as novelties; and near the close of the volume an essay in musical comedy, entitled, "Les Fastes de la grande and ancienne Mxnstrndxsx," in the course of which we are introduced to "*Vielleurs, Gueux, Jongleurs, Sauteurs et Saltimbanques, avec les ours et les singes*," not forgetting the "invalides ou gens estropiés au service de la grande Ménestresdese," whose performances come to an end in "désordre et déroute causés par les ivrognes, les singes et les ours." These, however, present exceptions to the general character of the collection, in which titles and music answering to them abound like *L'Enchantresse, Les Idées heureuses, La Volupteuse, Les Papillons, La Pateline*, and *Les Ondes*, the most touching and elegant only of which I thought I had marked in going through them, for my own and my readers' future reference. My marks are, however, too numerous to serve any purpose but that answered by notes of admiration. At the end of the volume will be found an "Explication des agréments et des signes," which should be carefully studied before any attempt is made to play the pieces which precede them. These "agréments" are not mere effects to be omitted at the will of the performer, but essential parts of

the music. It is greatly to be hoped that Herr Brahms will include in his collection of the works of Couperin "L'Art de toucher le Clavecin"—a short and well written treatise, now most rare, hardly less applicable to the keyed instrument of our day than of his, and from which the intelligent student may gather some idea at least of the manner in which the music of "le grand Couperin" and his successors should be played. One of not the smallest advantages which may result from re-publications like this which we owe to Herr Brahms may prove to be the restoration to the family of contemporary instruments of the harpsichord. Meanwhile, however, the pieces in them can be satisfactorily played on a pianoforte, and this by performers whose mechanical skill is a good deal inferior to their sentiment and intelligence.

JOHN HULLAH.

THE DRAMATIC SEASON, FRENCH AND ENGLISH.

THE season of French plays in London this year has been unusually long: but, with one or two brilliant exceptions, sterile of interest. Perhaps M. Félix had reckoned too surely on the expected visit of the Comédie Française, and had therefore neglected to provide other attractions. To begin with, the winter season was very discouraging. Everything, the weather, the illness of the Prince of Wales, the Christmas pieces, combined to keep the St. James's Theatre empty. Moreover it is to be feared that London playgoers have no genuine love for French plays. The fashionable world will go once or twice during the season because it is proper so to do, and furnishes a topic of conversation: but the general public is too little acquainted with French to be able to follow a play with facility, and too indifferent to buy the piece first and study it carefully. This lazy temper is due, to a great extent, to the present condition of our own stage. One of our modern plays taxes the attention so little, possesses so few claims to literary or artistic merit, that persons naturally conclude that the plays of other countries are equally insipid. That few of the Parisian novelties were given to us was no fault of poor M. Félix. Play after play was submitted to the Lord Chamberlain, only to be rejected by that Cerberus of our dramatic purity. When such works as *La Baronne* or *Fernande* were forbidden, one wonders on what principles his licenser makes his selection. Nor does this wonder diminish when we see the actual plays that are allowed. If *Fernande*, one of the ablest and most powerful dramas, and, it may be added, one of the most moral, that have been acted in France for many years, is too highly flavoured for the chaste eyes and ears of English audiences, why allow *Madame attend Monsieur*, a piece whose nastiness is only equalled by its vulgarity? Who are Chaumont and Schneider that they should enjoy privileges denied to others? And yet, during the very seasons in which Lafont was forbidden to play *Les Vieux Garçons* and the Comédie *Julie*, the second of these ladies, Schneider, was kicking up her heels as high as she liked in *La Grande-duchesse*, or hiccupping in *Périchole* louder than ever she dared in Paris. And lately, after the pieces alluded to above had been forbidden, M^{me} Chaumont was allowed to act and sing nearly every piece and every song that she chose. Was *Le Ménage en Ville* a delicate or an improving comedy? Could in fact anything be much coarser? But the pass we have come to is simply this—we are allowed to do anything we like on the stage in England, provided we say as little as possible. Society winks demurely at the nudities of burlesque, and blushes with simulated modesty at the *School for Scandal*, which would scarcely obtain a license nowadays.

After a few performances by M. and M^{me} Lafontaine, and a long series by M. Ravel, upon whom, it must be admitted, age is beginning to tell painfully, *Christiane* was produced, a four-act play by M. Gondinet. It is difficult to understand the reason why this play should have been so successful as it was in Paris: particularly before so critical an audience as that of the Théâtre Français. When it is read, the characters appear unsympathetic, the action prolix, and the dialogue destitute of wit or sparkle. But on the stage, thanks to the art of MM. Delaunay and Febvre, and the charms of M^{lle} Reichenberg, many of these defects vanish. Still it is a poor piece, and could not have done much to retrieve the fortunes of M. Félix, though it was

presented with much care, and the company played well together. Then we had M^{lle} Adèle Page in several parts—of which perhaps the hackneyed *Adrienne Lecouvreur* is the best : M^{lle} Fargueil in *Nos Intimes*, *Dalila*, and *Pattes de Mouches*—and lastly in *Rabagas*. By this time the company had been greatly strengthened, and the performance of the play was in every respect equal to the original one at the Vaudeville, and in some respects superior. As a social and political satire, it is difficult to overrate the merits of *Rabagas*, though as a play it is too long, and too deficient in interest. But nothing can be better than the conception of *Rabagas* himself : the noisy, pliant demagogue, who bullies his associates, and truckles to the prince—or than that of the prince himself, the very incarnation of high-bred gentility, kindly and humane ; and anxious, after his own fashion, to work out his people's good. Some of the smaller parts are excellent too. The chamberlain is a very humorous specimen of a court official ; and the republican coterie at the "Crapaud volant" is a singularly well-chosen assemblage of types, not too highly coloured, of extreme republicanism. The dialogue is admirable. Its shafts of wit and raillery spare no one : moderate men may laugh at the sarcasms levelled at their opponents, and communists rejoice that the party of order does not escape without a blow. Berton, who played *Rabagas* in London, conceived the part differently from Grenier, the original, who was specially chosen by the author to play it, and to play it in a particular way. He was noisy and blatant, and is said to have imitated Gambetta : Berton was voluble and oily, with an under-current of passion, that he could bring out upon occasion, as he does in the fine scene in act iv., when he flaunts the letter in Mrs. Blunt's face. M^{lle} Fargueil acted the latter personage far more finely than M^{lle} Antonine did. Her first scene with *Rabagas* was extremely clever ; she plays with the dreaded revolutionist, secure of victory in the long run, as a sportive spider might do with a rebellious fly ; and in the next act, when she has succeeded so far as to bring him to the palace, the scene in which she assures him he need have no fears on the score of what the prince may say or do, for "Le prince, c'est moi," was a triumph of acting of the highest quality of comedy.

In Paris itself no new play of importance, except *Rabagas*, has been produced since the war. There have been however some very interesting revivals, especially that of *Ruy Blas* at the Odéon. It was very nobly played throughout, by performers of education and refinement, who understood the literary as well as dramatic importance of the work they had to interpret. This was especially to be noticed in M. Geffroy, formerly sociétaire of the Français. His Don Salluste was one of those perfectly beautiful creations of the dramatic art which can only be produced after a lifetime has been spent in the study and practice of it, added to the possession of great individual talent and personal gifts. He looked like a portrait of Velasquez stepped from its frame : dignified, sarcastic, devilish : every gesture, every look, even the most insignificant movement, had a meaning, and served in some way to elaborate and complete the most perfect picture of a cold and haughty Spaniard that could be presented on the stage. The *Ruy Blas* of M. Lafontaine was picturesque, but unequal. He began very well, telling the story of his love in an undertone of grief that was extremely touching, and denounced the greedy senators with much fire and scorn ; but his love scene with the queen was a sad failure. He ranted and flung himself into attitudes that were meant to move to admiration, but succeeded only in moving to laughter. However, he made up for all shortcomings by his performance in the last act. He left nothing to be desired in that magnificent scene where *Ruy Blas* faces Salluste at last, and exclaims with exultation,

"Je te tiens écumant sous mon talon de fer."

Lemaître himself could hardly have been better : if indeed he was so good, for he never could have had the cultivation necessary for the adequate rendering of the poetic drama.

In London—apart from the usual dreary plays, to one or two of which the long-suffering audience has had the pluck to do summary justice—we have had some interesting revivals, among which that of Lord Lytton's *Money* at the Prince of Wales's must take the first place. The management has taken unusual pains with its production in every way ; and though faults may easily be found with parts of the interpretation, yet on the whole it is admirably rendered. And it must never be forgotten that the Prince of Wales's is the one theatre in London with a

company : a definite set of performers who are persons of talent, accustomed to play together, and of whom the very best are satisfied with small parts upon occasion for the sake of the work that has to be given. *Money* is full of small parts : but they are all good : on them the success of the piece depends : and they are nearly all associated with the name of some celebrated actor in the original cast at the Haymarket, which was exceptionally strong. At the Prince of Wales's they are all appropriately presented : the performers realise the character entrusted to them with intelligence : and if some old playgoer, whose recollections carry him back thirty years, should be crusty enough to maintain that they are not half as good as the originals, why, let him be set down as a grumbling, cross-grained, *laudator temporis acti* ! The Captain Dudley Smooth of Mr. Archer is quite admirable. He is new to the London stage ; and his acquisition for such a part as that is singularly fortunate. His quiet easy bearing, his cat-like step, his thin lips, long hands, pale face, and premature baldness, combine to realise to the life the portrait that the author has drawn of the consummate gambler, "who never inherited a sixpence, never spent less than 4000*l.* a year, and never told a soul how he managed it." It is difficult to imagine how Wrench could have been better : but it is said that he was. It is much to be regretted that the opening scene of act iv., in which Smooth leads Evelyn's tradesmen to believe that he is ruined, without committing himself to anything more definite than "Have you been paid, Sir?"—should have been suppressed. Mr. Coghlan gives us, for the first time, a thoroughly consistent, flesh-and-blood, Evelyn. Hitherto the part has been played in that stilted, pompous style that was thought proper for all meditative persons from Hamlet downwards, till Fechter banished it, let us hope for ever. Perhaps the highest praise that can be given to Mr. Coghlan is to say that he manages to make all the "tall talk" written down for Evelyn appear plain natural common sense—a feat that surely no actor ever achieved before ! At times he may be a little too brusque : but the author evidently intended that Evelyn should be downright rude at times to Clara Douglas, or too sharp in attacking the weak side of Sir John Vesey's character, or deficient in polish when doing the honours of his own house : but after all the adverse criticism that can be brought against him has had its say, one is compelled to admit that he is the one supremely able exponent of the part that has been seen in our time. It is a pity that Mr. Hare should have attempted to portray that bland and unctuous humbug, Sir John Vesey. His sharp, crisp manner is quite out of place there ; and he seems unable or unwilling to adopt any other. Miss Brough is a very graceful Clara, and Mrs. Bancroft, of course, an excellent Georgina : but Mrs. Leigh Murray is overweighted with the lively, audacious Lady Franklin : a part which would have been far more suitable for Mrs. Bancroft herself. But, whatever fault we may find, however justly we may criticize minor defects, *Money* is very well played at the Prince of Wales's, and the public evidently take a delight in seeing, what is so rare in England, a good play well performed. That the public does like good old plays better than indifferent new ones is proved by the fact that *London Assurance* lately ran for nearly two hundred nights at the Vaudeville, only to be displaced by that dramatic evergreen, *The School for Scandal*. The absence of anything like a school of acting in England becomes painfully evident when one of the old comedies is attempted. The language, the manners, and the dress are alike strange to the performers, who are infinitely more at home in the tomfooleries of burlesque. This is particularly the case at the Vaudeville, where the representatives of Sir Benjamin Backbite and Crabtree play leading parts in the *Very Last Days of Pompeii* afterwards, and have imported the airs of the burlesque into the comedy. The sight of so many people on the stage at once as are assembled in Lady Sneerwell's drawing-room seems to suggest a breakdown to their minds : and one cannot help fancying that their arms and legs every now and then give involuntary twitchings, and that a general dance of all the characters is becoming inevitable. That the actors should be strangely and incongruously dressed was only to be expected from the usual practice of our stage in these matters. Still, it is surely very odd that the style of a century ago should have been so completely forgotten as to admit the ludicrous caricatures one sees in what are called "costume pieces." What would be thought of a gentleman who walked down Pall Mall in a dress coat, a

morning waistcoat, a pair of footman's breeches and stockings, and a coachman's wig on his head? Yet certain characters at the Vaudeville cut no better figure. Mr. Farren's Sir Peter Teazle is an accurate copy of one of his father's great parts, but, like all copies, wants energy and nature: it is sensible, however, and painstaking. The Lady Teazle of Miss Fawsitt is bright and animated. By far the best piece of acting, however, is the Joseph Surface of Mr. Clayton. Throwing aside all the traditions, he makes Joseph a gay man of fashion (as the play warrants him in doing) who is quite as ready as Charles for any intrigue that may fall in his way, only he is a calculating, hypocritical schemer. He is really in love with Lady Teazle, and only affects a devotion to Maria for the sake of her fortune. Mr. Clayton realises this view in a way that leaves nothing to be desired. His deference to Lady Teazle whenever they meet is admirable, and the love scene in act iv. as passionate as the dialogue warrants, and that is saying a good deal. To this fine conception he adds a perfect bearing, and a costume that is accurate to the minutest detail of the time.

Mr. Bateman's management of the Lyceum seems likely to bring forth good results. *The Bells* was a well-written melodrama, original in idea and execution, and admirably acted, not merely by Mr. Irving, but by the whole company. The production of *Medea* would seem to show that he is anxious to try whether poetic plays can ever again become popular in this country. That he should have selected the well-known story of "Medea" may excite surprise: for she is an utterly unsympathetic person, whose conduct almost justifies Jason's treatment of her; and the other people of the play are dummies—from that terrible bore Orpheus down to the two children. Moreover, the conception of the part is encumbered by the recollection of three great actresses—Pasta, Ristori, and Titiens. Out of these unpromising materials, however, it must be admitted that Mr. Wills has made a very good play. His verse cannot be called musical or scholarly: there is no classical feeling whatever in his work from beginning to end; but he has cleverly arranged the story so as to keep its human side prominent: he has made some changes so as to bring forward Medea's love for her children; and he has introduced a very effective incantation, with the proper accompaniments of a darkened stage and a red light. But the demerits of the play are forgotten in the admiration called forth by the talent of the principal performer. Miss Bateman is not merely a clever exponent of the part: she is an artist endowed with real tragic power, who, whether in pathos or in passion, carries her audience with her, and makes them forget all that is stilted or absurd in the play in sympathy with the heroine with whom she has identified herself. From her performance of Leah it might have been expected that she would have been greatest in passages of indignant declamation; but this is not so. The scene in which she is threatened with the loss of her children develops in her a new power: that of touching her audience by her ability in depicting tenderness. Moreover, it is most agreeable to notice how Miss Bateman progresses in excellence. Her Leah was good: her Mary Warner was better: but in Medea she has made a decided advance, which augurs great things for the future. It is refreshing to think that we have at last a tragic actress: that if plays be only forthcoming, an adequate exponent will not be wanting.—Curiously enough, at this very moment the Théâtre Français exclaims that it has discovered a real actor—young Mounet-Sully, a pupil of the Conservatoire, who bids fair, they say, to rival Talma in his greatest parts—to be as a man what Rachel was as a woman: to achieve, in short, the highest distinction in his art.

J. W. CLARK.

ART NOTES.

The Imperial Austrian Commission has issued the programme and regulations in accordance with which the Imperial Government proposes to conduct the Exhibition of 1873. All applications and enquiries must be addressed, up to August 24, by British exhibitors, to the English Royal Commission, through the secretary, Philip C. Owen, Vienna Exhibition Offices, 41, Parliament Street, London. The Austrian commission will communicate with exhibitors from foreign countries solely through the commission appointed by each country for that purpose. The exhibition opens the 1st of May, and closes the 31st October,

1873. Lists are to be sent in of the exhibitors, together with the plan of space required, before 1st January, 1873. Exhibitors have to defray all expenses not provided for by the Austrian commission, which has made arrangements for the reduction of transport charges within its own dominions. Exhibitors of fine arts are exempted from any charge for space. Insurances against fire are to be effected by the exhibitor at his own expense, and he is also responsible for the packing, forwarding, receiving, and unpacking of his goods both for the opening and close of the exhibition. The objects will be submitted to the judgment of an international jury, and special regulations will be issued for the fine arts. Exhibitors receive tickets entitling them to free admission.

The *Gazette des Beaux-Arts* for Aug. 1 contains an important contribution from the pen of M. Henri Delaborde. The article in question is entitled "Les Estampes d'Andrea Mantegna," and forms part of a work on the Elements of the History of Engraving which M. Delaborde is about to publish. Independently of its critical value it will be read with pleasure on account of its intelligent and sound method, which is eminently just, and appropriate to the nature of the subject in hand, being equally distinct from the dryness of German matter of fact treatment and from the English mode of chronicling subjective impressions in euphuistic language. The designs reproduced are—"the Judith," engraved by Mocetto; "Saint Sebastian;" "The Virgin and Child;" and the "Entombment," engraved by Mantegna. The subject of this paper is specially the pieces engraved by Mantegna, and M. Delaborde does not enter into any appreciation of the value of the popular attribution to Mantegna of the designs for the Hypnerotomachia Poliphili, the importance of which in its bearing on the history of the architecture of the Renaissance has been estimated once for all by M. Darcel. Two points are specially well touched by M. Delaborde—first, the way in which Mantegna from the first strove to harmonize his archaeological aspirations with the suggestions of his own genius; and, secondly, the predilection he has shown for scenes of violent emotion: it is in treating these that he displays the most profound power of invention. Mere talent is all that he evidences in such subjects as have their chief significance in the sentiment of tenderness, or compassion; whereas in such compositions as either of the Entombments we have the accent of genius.—The remaining articles are—a useful paper on the Musée de Lille (first article), by M. Louis Gonse; a notice of contemporary engraving in the Salon of 1872, by M. René Ménard; a third chapter of the "Correspondence of Léopold Robert," edited by M. Charles Clément; a notice by M. Champfleury on a collection of comic drawings which belonged to Catherine de' Medici; the correspondence of the directors of the French Academy at Rome; the letters of Vien and Natoire (tenth article), edited by M. A. Lecoq de la Marche; Flemish artists of the Renaissance, by M. J. Houdoy.—Amongst the most noteworthy of the illustrations are MM. Lonsay's and Jobert's reproduction of Mantegna's engraving of the "Entombment;" the engraving by M. Gaillard of a bronze bust of Dante in Sir Richard Wallace's collection; and a very graceful and artistic engraving by M^{lle} Hélène Boetzel, from a drawing by M. Édouard Frère of "Children leaving School."

The Royal Archaeological Institute met on August 1 at Southampton; the concluding meeting was held on Thursday 8, and the following resolution was unanimously carried:—"That this meeting has heard with deep regret of the projected destruction of 'Caesar's Camp,' near Wimbledon Common, and wishes to represent to the Council of the Institute its earnest desire that they should take such steps as they may think best for the preservation of that ancient historical monument." If we had a Chief Commissioner of Works sufficiently educated to have a proper knowledge of his duties, the task of saving from destruction such an historical monument as this would not be left to the chance zeal of private societies.

The Russian empire has been amongst the most active of those states which have, since the second International Exhibition at London in 1862, turned their attention to the development of industrial art by the means of schools and museums. In 1864 there was opened at Moscow a museum attached to the

Strogonoff School, which had been at work ever since 1860 at the training of designers for manufactures and teachers for schools. Both these institutions are supported by the government: the school receives an allowance of 16,000 silver roubles, and is attended by about 209 pupils. Similar efforts are being made at St. Petersburg. It is proposed to enlarge the schools at St. Petersburg and Moscow, to increase the importance of the Moscow museum, and to place the provincial schools of drawing, together with those of St. Petersburg and Moscow, under one central direction.

The death of M. F. Gillot, which has just taken place at Paris, must not be left without mention. M. Gillot was the inventor of paniconographic engraving, the influence of which on the diffusion of illustrated journals and musical publications can hardly be appreciated too highly. Formerly everything had to be engraved by hand, but M. Gillot, by means of a long sought and carefully perfected method, solved the problem of cheap engraving. Drawings submitted to the action of the acid became in twenty-four hours thoroughly bitten in, so that an immense number of impressions could be taken from them. The works of Doré, Marcellin, Cham, Bertall, have thus been popularised; even the *Gazette des Beaux-Arts* has more than once had recourse to this method.

The first part of the catalogue of the paintings contained in the museum at Madrid has at last appeared. It contains the Italian and Spanish schools. The second instalment is to contain the Flemish, Dutch, German, and French. With the second instalment, the editor, Don Pedro de Madrazo, promises to give to the world facsimiles of all the most interesting signatures to be found on the various works which form this magnificent collection. M. Paul Lefort, in the *Chronique des Arts* for July 20, assures us that this laborious undertaking has been conducted with equal science and sagacity, and fulfils in every respect the most exacting requirements of curiosity and criticism. Don Pedro de Madrazo has patiently analysed the archives of the palace, and the thousand curious details which he has found in them have been condensed into the notes with which he accompanies the description of every picture. In cases where the editor has had (in the absence of any certainty) to choose the most probable attribution, he invariably furnishes the reader with the text of all the documents on which he has founded his conclusions.

The fourth edition of M. Alfred Michiel's *Voyage d'un Amateur en Angleterre* has just been brought out by Renouard. This work has steadily gained in reputation ever since its first appearance.

The well-known artistic glass-painting establishment of M. Maréchal is about to be transferred from Metz to Blois.

Melkshott Court, near Romsey, the seat of Lady Ashburton, has been almost destroyed by fire, which broke out on Friday, August 2. The building is fortunately of recent date, and all the works of art (which were very numerous and valuable), together with the library, were preserved by the energetic exertions of the neighbourhood.

The fourth edition of the catalogue of the collection of portraits, which forms the chief feature of the Dublin Exhibition, is now published. Portraits too form, it is said, the staple of the fine-arts department of the Lyons Exhibition, which was opened July 7. M. de Rayssac remarks, in the *Chronique des Arts*, that there is little or no high art, and an enormous quantity of portraits rarely satisfactory, but, on the other hand, many remarkable landscapes and fine examples of still-life painting. These, he adds, are the usual features of contemporary exhibitions. A gallery for fine arts has also been attached to the Universal Exhibition for Domestic and Industrial Economy, which was opened in the Champs-Élysées, July 28. This exhibition will remain open till November 1.

On Saturday, August 3, the British Museum estimates were presented to Parliament by Mr. Walpole. Mr. Wood's estimate of the sum required for the completion of the excavations of the Temple of Diana at Ephesus amounted, said Mr. Walpole, to

6000*l.* The trustees of the Museum had applied to the Treasury on this subject, and the Chancellor of the Exchequer, "who took the greatest possible interest in these excavations," had at once stated his readiness to grant the sum required by supplementary estimates, 3000*l.* this year, and 3000*l.* next. It may here be mentioned that on the 2nd inst. the lowest drum of the *columna celata* found at Ephesus nearly entire (see *Academy*, vol. iii. p. 285) arrived at the Museum.

Amongst the most notable works of art which have lately changed hands we may specify—Gainsborough's full-length portrait of Sheridan, dated 1783, purchased by Baron Rothschild for 3200*l.*—At the sale of Mr. Curling's collection, by Christie, Manson, and Woods: Webster's "Village Choir," which fetched 766*l.*; Cooper's "Cows and Sheep in landscape," 462*l.*; Herring's "The Start for the Derby," 660 guineas.—At the sale of the Durand-Dubois collection in Paris, M. Charles Nittier bought on behalf of the Opéra all the old drawings of the decorators and scene-painters Brongniart, Mauro, Ciceri, &c. &c., also two full-length portraits of Fanny Elsler by Deveria. There was a lively competition for a pencil-drawing by Eustache Lorsay of an ex-artiste of the Palais Royal, M^{lle} Laure Lambert, who is at present M^{me} Émile Augier.—On Thursday, August 6, Sir George Chetwynd's collection of English, Italian, and Anglo-American coins and medals came to the hammer.

A curious musical MS., containing the words and notes of Luther's favourite hymns, collected and arranged for him by his good friend, "Herr Johann Walther, Componist Musice zu Torgau, 1530, dem Gott gnade," has been lately carefully edited and reprinted in facsimile by O. Kade. Apart from the interest which attaches to the exact words, &c. used by the reformer in the domestic concerts of which he was so fond, the publication is of course very interesting to musical antiquarians.

New Publications.

- AUBERT, E. Trésor de l'Abbaye de saint Maurice d'Agaune. Paris: Morel.
- DIDOT, A. F. Étude sur Jean Cousin, suivie de notices sur Jean Leclerc et Pierre Woëriot. Paris: Didot.
- GALERIE THÉÂTRALE, ou Collection de Portraits en pied des principaux acteurs et actrices français depuis 1552, gravés par les plus célèbres artistes, avec notices biographiques. Paris: Barraud.
- GOBINEAU, le Ch. de. Souvenirs de Voyage. Céphalonie, Naxie et Terre neuve. Paris: Plon.
- HARDWICK, C. Traditions, Superstitions, and Folklore (chiefly Lancashire and the North of England); their affinity to others in widely distributed localities; their Eastern origin and mythical significance. Simpkin and Marshall.
- HITTORFF, S., et ZANTH, L. Architecture antique de la Sicile. Recueil des Monuments de Ségeste et de Sélinonte. Suivi de recherches sur l'origine et le développement de l'architecture religieuse chez les Grecs. (Complément des ouvrages publiés 1826-30.) Paris: Franck.
- MARESCHAL, A. La Faïence populaire au XVIII^e siècle, sa forme, son emploi, sa décoration, ses couleurs et ses marques. Paris: Delaroque.
- MORAND, Fr. Les jeunes Années de C. A. Sainte-Beuve, suivies de réflexions et jugements de son père sur la Terreur. Paris: Didier.
- OVERBECK, T. Atlas der griechischen Kunstmythologie. 1. Lfg. Leipzig: Engelmann.
- QUÉRARD, J. M. Oeuvres posthumes; publiées par S. Brunet. Bordeaux: Dumoulin.
- TOURGUENEFF, Alex. Lettres à son frère Nicolas. (In Russian.) Leipzig: Brockhaus.

Physical Science and Philosophy.

The Introduction of Cultivated Plants and Domestic Animals into Europe. [*Kultuspflanzen und Haustiere in ihrem Uebergang aus Asien nach Griechenland und Italien, sowie in das übrige Europa.* Historisch-linguistische Skizzen von Victor Hehn.] Berlin: Gebrüder Bornmeyers, ed. Eggers, 1870.

MAN's efforts to supply his necessities or multiply his enjoyments, his strivings after "panem et Circenses," may seem to fall as regards the past entirely within the realm of the

historian, and as regards the future within the realm of the politician. But investigators, like other organisms, are mutually interdependent, and investigations regarding "all men's labour under the sun" must be largely biological if they are to be at all complete. For much of all that labour relates to organic nature, its processes admitting of being viewed as the selection, its results as the survival and pre-eminence, of rival forms of life. The work now before us, Herr Victor Hehn's *History of the Introduction of Cultivated Plants and Domestic Animals into Europe*, professes to give us sketches of the history of the subordination of such plants and animals to man's needs so far as literary, that is, historical and linguistic, research can help him towards doing it. This profession, which is made upon the title-page, is fairly carried out in the body of the work; but in justice to the author we may say that he goes beyond his promises, and that the names of de Candolle and Unger amongst modern and those of Theophrastus and Pliny amongst ancient naturalists are to be found amongst his authorities, as well as those of the poets like Homer, and the historians like Herodotus, who give us so much more or less indirect information by making and omitting to make allusions to the natural history of their days. In one word, our author has to deal with an ethnographical and physico-geographical subject, and he has not wholly neglected its physical aspects.

If, after the fashion of a recent writer in the *Contemporary Review*, we take in the first place and as our surest gauge a purely quantitative estimate of Herr Victor Hehn's work, we must say that being but a nineteenth-century octavo of some 450 pages, it contrasts to disadvantage with such a vast and weighty folio as Bochart's *Hierozoicon*, which again, in its turn, must have looked but a pigmy by the side of the "ingens volumen" which Bochart himself speaks of with a shudder (*l. c.* ii. 814) as having been written by a certain Bustamantinus, de SS. *Animalibus*. In all seriousness, however, the subject is a very large one, Herr Hehn speaking himself with great propriety of the literature bearing upon one single department of it as "unermesslich;" and it is all we can or ought to expect if within the limits just specified we have some of the relations which the entire subject has to the history of the progress of our species sketched out, and some of its special concrete examples worked out for us. This the author has done.

In his introductory pages, pp. 3-10, Herr Victor Hehn treats of the large question of the possibility of the restoration of certain of the countries of antiquity, such as Greece, to the condition of fertility which they enjoyed, or are supposed to have enjoyed, in the times of the ancient writers; and he does wisely in siding with Unger in holding that "the thing that hath been, is," or at least, with ordinary care, may be, "the thing that shall be"; and in repudiating the doctrine of necessary decadence and exhaustion embodied in the words *loci senium*, endorsed though it be with the names of Fraas and Curtius. The very simple precaution of preventing the goats from destroying in Greece, as they have all but finished destroying in St. Helena, the forest-trees, by cropping their early buds, would enable the inhabitants to dispense with artificial plantation; and at the same time Herr Hehn points out that the utterances of the ancients are not all unanimously in favour of green fields and purling streams having been the characterizing features of the landscapes they lived in, for that the "woods which cool Ilissus laves" were not planted in what had been previously a bare treeless Attica till the time of Pisistratus (see Dio Chrysostom, *Or.* 25, p. 281 C), and that Plato years after spoke of the Ilissus itself as being but a rivulet, ἰδάριον. Sophocles, we may add, would scarcely have devoted so many lines as he has done in the *Oedipus*

Coloneus, 668-705, to the description of masses of green foliage, of the trees which composed those masses, and of the nightingales which sang in them, if such a description would have applied with truth to other parts of Greece, or indeed to other *demes* in Attica. It is only after a long sojourn in London, or after a lengthy travel in some such country as Palestine, that green comes, in Sir Francis Palgrave's language, "to comfort the eye and the mind;" and the force of such poetical description as the one we have just referred to was the force which is given by contrast.

H. Hehn notices the alarmist views of the agricultural chemist as to the exhaustion of the soil by the cropbearing to which it has been subjected for now so many successive wasteful generations. These too he sets aside, ascribing the decadence of agriculture in Greece to the non-adoption of scientific methods in the husbandry of the country, which *vera causa* again is the outcome in the last resort of the disadvantage which Greece labours under as compared to Italy owing to the large immigration of Slavonian, Albanian, and Turkish semi-savages, and the insecurity for and the paucity of capital which this calamity has entailed.

Ten pages (10-20) are devoted to a sketch of the condition of things which prevailed in the two peninsulas of Greece and Italy when the first Aryan immigrants (whom he does not suppose with Mr. Fergusson, *Rude-Stone Monuments*, p. 39, to have been "figured under the myth of the return of the Heracleidae") entered it. He draws our attention to the great advantage which accrued to the invaders who penetrated farthest south into the two peninsulas from the more intimate relations which they were thus able to enter into with the Phoenicians, who in those early days had attained so large a mastery of the arts and inventions which are prerequisites of civilisation.

Three more or less general *résumés* of the conclusions to which his special investigations have led him are to be found in different parts of the book, pp. 314-316, pp. 355-368, and pp. 387-395; but the bulk of the book is made up of accounts, which begin immediately after the sketch of primordial times just alluded to, of the introduction and adaptation to human uses of various plants and animals. Herr Hehn's general surveys and summaries, even when we rank his introductory pages with them, fill up but some forty pages, but they contain a very large number of highly suggestive and thought-awakening general principles which vivify, whilst they help us to colligate, the vast mass of details which some threescore and ten special investigations entail upon his readers. The portentous load of concrete facts which his memory has had to carry has not deprived our author, as it deprives so many men similarly conditioned, of the faculty of graceful and artistic exposition; and the effects of intercourse are shown to have manifested themselves pictorially, or rather to have been measurable picturesquely, by the changes they produced in external organic nature, or, in one word, in the *landscape*, as plainly as, or even more strikingly than, by those other changes which are more usually held to be exact measures of the progress of civilisation. The characters given by the annalists to Tullus and Ancus do not differ more from those given by the historians to Pompey and Lucullus than did the landscape presented by early Italy differ from that of Italy in the first century before our æra. Oaks, limes, beeches, and pines clothed the hill—and indeed the mountain sides of Italy in its pristine days, but these trees had given way to the chestnut, apple, mulberry, cherry, and plum trees of man's introduction, whilst the olive, vine, and fig had occupied the lowlands when Varro (*fl.* B.C. 116-27) was justified in saying that Italy was so planted with fruit-trees as to look everywhere like an orchard. We doubt, however, whether the Ciminian wood,

which Livy (9, 36) and Florus (1, 12) in their rhetorical language compare with the German and Caledonian forests of their own day, could have coexisted with Etrurian civilisation even in the early periods indicated to us by the legend of the Tarquins; large forests and high civilisation being incompatible. At any rate Herr Hehn, in quoting Livy's words, and Livy in quoting the annalists' words, as to the existence of such a barrier against the march of an army some forty miles northwards of Rome in the year 308 B.C., should have pointed out that they were inconsistent not only with the whole condition of political and military movements described as then prevailing, but also with the account given (Livy v. 32) of Roman armies and their expeditions nearly a century previously. But we would also remark that the postdating of the persistence of the forest with all its characters of "invia atque horrenda" into the days of Papirius and Fabius shows that the early annalists must have dwelt upon those characters with considerable force and iteration in telling or distorting the legends, which we suppose to have really belonged to those far earlier times in which Tuscan power was yet but half developed, whilst Rome existed but in the embryo form of a small community tolerated in semi-independence partly on account of its insignificance, partly on account of the isolation which the legend, speaking so strikingly of the existence of woods, shows us that woods may have secured for it. We should also demur to Herr Hehn's ranking the Etrurians with the Indo-Europeans (p. 15), and to accepting the legend of their entrance into Italy having taken place from the north, and should use his own elegant analogy drawn (p. 389) from the fact that our best fruit-trees are the result of the engrafting of Oriental branches upon Western stocks to express the relation which was really held by the complex result of Roman culture to Etrurian and indigenous factors respectively.

Herr Hehn has well pointed out (p. 359) how ruinously one of the most prominent doctrines of the political economy of the old world, expressed by Cato in the words, "quae nasci in fundo ac fieri a domesticis poterunt, eorum ne quid ematur," or, he might have added, in the still older and equally foolish aspiration of Dicaeopolis (Aristoph. *Acharn.* 35), for the country where $\delta \pi \rho \iota \omega \nu \delta \tau \eta \nu$, operated on the mechanical arts by checking the development of trades within the cities. But according to our author there was at work a deeper cause than even the non-recognition of the principle of division of labour to account for the stationary character of the mechanical arts among the ancients. They had, according to him (pp. 359, 360), no aptitude for the study of natural phenomena, living as they did in an ideal world, given up, as aristocratic castes are often given up, to the enjoyment of the artistic instead of to the pursuit of the real. But that he is wrong, at least from an aetiological point of view, when he says (p. 367) that what differentiates the modern from the ancient world is natural science, the arts, and political economy, as also when he says (p. 360) that the ancients lived immersed in dreams of religious fancy, and when he suggests (p. 361) that the evil influence of slavery (and the latifund system connected with it) may have been overrated, will be allowed by most persons. Again, it may be true enough (see p. 362) that the spirit of Christianity opposed itself to the Roman spirit of war, and that it was also so alien from the spirit of Roman law, in the codification of which the last manifestations of intellectual life under the empire were exhausted, that the name of scarcely one of the great Roman jurists can be pointed out as being that of a Christian, and that thus law and war, the two chief pillars of the Roman economy, were undermined by the new religion. But our author is at variance not only with himself, but also with the facts, when he hints that

the new religion was at all more opposed to the spirit of natural science than the mind of the old world had shown itself to be, and the remains of Pompeii, where want of comfort, where imperfection of apparatus and poverty of instruments are so strangely noticeable side by side with works of unquestionable artistic beauty, if not always of unquestionable taste, testify to this at the present day, as he himself remarks (see p. 360). H. Hehn, again, is only right to a certain extent in insisting (pp. 358, 359) that much of all the good which might have accrued from the road-making of the Romans was neutralised so far as purposes of commerce and trade were concerned by the imposition of heavy tolls upon traffic, by their system of monopolies, and by their prohibitory tariffs. For if we take, as our author insists we should take, the history of the introduction of domestic plants and animals as a measure of the freedom of intercourse existing at various periods in the civilised and semi-civilised world, the history of such a plant as the cherry which spread in the 120 years which elapsed between the period of Lucullus' Mithridatic war and the time of Pliny into Spain, Belgium, and England, must be taken as indicating the existence of a tolerably free system of interchange and of intercourse. The chestnut, again, another stranger from Pontus, must have spread with even greater rapidity, as Amaryllis, who lived, in imagination, a considerable time before Pliny, was acquainted with and indeed (see Vergil, *Ecl.* ii. 52) not insensible to its merits. The parable of Jotham (Judges ix.), which H. Hehn assures us is now very little read, and which he consequently is kind enough to translate in full for his readers, shows us that the fig, vine, and olive were, at an early period, "dwellers in Mesopotamia and Judaea"; and though they were at a disadvantage as compared with the more hardy northward ranging plants just mentioned, which came, together with "nuts and almonds," from the Armenian region, they still had established themselves on the western shores of Italy before the period of authentic history. For in the legends the fig shelters Romulus and Remus and their she-wolf nurse; and though the law ascribed to Numa, and forbidding the use of wine for sacrificial purposes (p. 27), may seem to show that this "demoniacal drink," as Hehn calls it (*l.c.*), was looked upon in early Italian times as metal knives were looked upon by Zipporah, viz. as something too novel to be used in religious rites, still the legend does prove that wine was known at an early period in Italy, and at how early a period we can only guess, as the priests, especially if they looked upon wine as our author appears to look upon it, may have thought that no lapse of time would qualify such an invention for employment in their rites and ceremonies. The words, thirdly, of the old annalist, Fenestella, preserved for us by Pliny (*N. H.* 15, 1, 1), as they connect the date of the introduction of the olive with the name of Tarquinius Priscus, and so with the period of Etrurian influence, complete the chain of evidence; and we may further remark that, well suited to and indeed now even distinctively characteristic of the Mediterranean region though the olive be (Grisebach, *Die Vegetation der Erde*, i. 244), there can be no doubt that it was introduced into and not indigenous in Italy, and that its title, "bacca Sabina," shows therefore that this introduction took place at a period to which the memory of men reached not back, at least in the days of Juvenal. The peach (*Amygdalus persica*) and the apricot (*Prunus armeniaca*), coming from the parts of Asia which their scientific names denote, did not establish themselves in Italy till the first century of our aera, and we find no mention of them made in any writer of the Augustan age. It was left to the Moors and Crusaders to introduce the lemon, and, according to Hehn (p. 331), to the

Portuguese to introduce the orange, the "China orange" of some English writers, and the "Apfelsine" of the Germans, into Europe about the year 1548. The linguistic evidence for the introduction of the orange by the Portuguese may seem singularly complete, the modern Greeks calling the fruit *πορτογαλέα*, the Albanians *protokale*, the Italians *portogallo*, and, most striking of all, the Kurds *pottoghal* (Pott. *Zeitschrift für Kunde des Morgenlands*, 7, 113). But de Candolle (*Géographie bot.* 868) is of opinion that here, as in a good many other cases, reputation is in inverse ratio of desert, and that the orange, introduced from China at a comparatively recent period into India, was carried thence into Europe by the agency of the Arabs, Genoese, and Venetians some twenty-five years earlier than the date assigned by Herr Hehn.

If we lay aside the consideration of these somewhat small questions of priority, and look at the large-scale relations which have subsisted between India and China on the one hand, and Europe on the other, we shall note that, two thousand five hundred years before the days of Vasco de Gama, Solomon and Hiram contrived to introduce apes and peacocks into Palestine from India, and that with the exception of the sugar-cane, introduced, like the fiddle and the organ, by the Arabs, and the buffalo, Europe gained scarcely anything from India in the long period just mentioned. Surely the nations who extinguished Tyre, Sidon, and Carthage, must have been as much inferior to the Phœnician races in navigation and maritime enterprise as they proved themselves to be superior in military skill. What would Pytheas have thought if he had been able to foresee that Ireland would remain as little known to the Roman occupiers of Great Britain as New Guinea is now to the Anglo-Saxon and Celtic occupiers of Australia? How Pliny ought to have blushed for his countrymen when he had to confess that his knowledge of the Canary Islands had come to him but secondhand from King Juba! Herr Hehn says (p. 366) that the Roman empire might have been saved if it had been possessed of gunpowder, wherewith to keep back the barbarians, and of paper, upon which the entirety of Greek and Roman literature, including, we suppose, the writings of Crispinus, Fannius, and Tzetzes, might have been preserved, for use, we may suggest, in our public schools. But with the instances just given of the inaptitude for improvement, and of the slowness to exert itself for the benefit of mankind which the Roman empire manifested after it attained its definite establishment, we think mankind is perhaps to be congratulated upon the retardation of the invention of two commodities which might have secured a still longer tenure of power to the Italian mistress of the world.

It would be impossible, within the limits, we will not say of one or of two articles, but of very many articles of ordinary length, to follow Herr Victor Hehn through each of the detailed investigations into the history of our now familiar domestic animals and cultivated plants with which he has favoured us. There are about seventy of these histories, each one of which would furnish a large mass of matter for discussion; and the author goes beyond his undertaking as signified in his title-page, and adds to these old-world histories much that is interesting with reference to our obligations to America and her contributions to the landscapes and dietaries of modern Europe and Asia. He enumerates, and rightly, the Indian fig, the agave, and the Occidental plane, together with the potato, the tomato, and the tobacco-plant, but, whilst omitting the fuchsias, he adds to his list (p. 385) the Lombardy poplar (*Populus dilatata*), to which no American has, we imagine, since the time of the elder Michaux, made either direct or indirect claims. If men of science, who are, as Mr. Ayton rejoices to think, but a

small minority of mankind, demur to this statement, the immense majority of mankind (who are not scientific) will demur to another made upon the next page, where our author discharges a copious vocabulary of abuse upon the habit of smoking tobacco. He calls it upon that single page (p. 386) a barbarous custom, "ein barbarischer Gebrauch," and a hateful habit, "eine hässliche Gewohnheit," and this so-called "fragrant weed" itself he styles a kind of poisonous nightshade, "eine Species giftigen Nachtschattens." In days when an attorney-general has been howled at by an untruth-loving multitude because he had called things by their proper names, we may mention with praise the wholesome habit which our author has of expressing his likes and dislikes in plain language; and if any of our readers are curious or anxious to know what Herr Hehn's feelings are towards Turks, Magyars, and Slaves, we may refer them to pp. 10, 364, and 425, where, whatever else they may object to, they will not have to object to any want of outspokenness.

A little more respect, however, for ancient literature, if for nothing else, might have saved our author from one of the few mistakes into which he has fallen, and would have prevented him from going out of his way (p. 181 and p. 435) and beyond both his authorities and the facts themselves to attack the correctness of the passages in Genesis xii. 16 and Exodus ix. 3, in which the camel is spoken of as being used in Egypt in the times of Abraham and of Moses. It is well known that Desmoulins long ago proved (*Mémoires du Muséum*, tom. x. p. 221, 1823), so far as literary evidence can prove such a point, that the camel was not largely used in Africa west of Egypt till a much later period in the world's history than the one we have referred to, but Desmoulins himself accepts the accuracy of the statements in the Pentateuch, and gives it as the result of his enquiry that Arabia, a country conterminous with Egypt, and Persia are the native region of the dromedary. But further, Mr. Horner (*Philosophical Transactions*, 1858, p. 59; cf. Lyell's *Antiquity of Man*, p. 35) and Lieutenant Newbold (*Proceedings of the Geological Society*, 1842, vol. iii.) have dug up dromedaries' bones in various deposits, alluvial and marine, in the Delta and on the west coast of the Red Sea respectively. We take this opportunity of saying that very strong evidence may be brought forward for the early and usually accepted dates of the books of the Old Testament in the same way as is done for those of the genuine Homeric poems, from the allusions they make to the plants and animals with which man is represented as coming into contact; and that this evidence may be brought out strikingly by a comparison of the real renderings of the Hebrew names of these animals and plants with the renderings given by St. Jerome, who learnt Hebrew only in middle life, and then assuredly imperfectly. The common fowl, for example, a bird the mention of which by the writer of the *Batrachomyomachia* proves him, as Payne Knight long ago observed (*Prolegomena*, vi.), to have been of a later than the Homeric age, finds a place some twelve times in the Vulgate as *Gallus gallinaceus*, though nowhere in our more correct version; and the tiger is found occupying in the former of those versions a place which in the latter is occupied, as in fact it only could have been, by the lion. Whatever such blunders as these may make us think of the learning (for learning alone, as distinguished from science, would have been sufficient to prevent the commission of them) of the early father in question, the fact that they are blunders, committed by him, and not by the writers whom he undertook to translate, is one which we commend to the serious consideration of H. Hehn as speaking somewhat plainly in favour both of the authenticity and of the authority of the writings which he sets aside so cavalierly.

In the two last pages of his text, H. Hehn has some remarks upon the numerical predominance which dark hair is gradually obtaining over light hair in the world as we now see it, and as this subject is of great ethnological and (if we may argue from the attempt of the late eminent theologian, Chr. H. Weisse [*Psychologie und Unsterblichkeitslehre*, p. 311], to correlate the colour of the hair and eyes with variations of our mental and moral nature) of even higher interest, we must point out a few particulars in which our author has fallen short either of completeness or of correctness. Firstly, Herr Hehn would have been liable to the charge of hastiness for arguing that the Scythians and Thracians of antiquity were dark-haired, because the Greeks and Romans, themselves a dark-haired race, would otherwise have stated that these two races differed from them in this particular. Secondly, as a matter of fact, the ancient Greek and Roman writers are not silent upon the matter; but when they do speak of it, they say exactly the reverse of what our author anticipates they would have said. Sidonius Apollinaris, in his *Panegyric on Majorian*, as also elsewhere, may not be taken as an undeniable authority, still the words, l. 218—

"Scythicisque choreis
Nubebat flavo similis nova nupta marito"—

count for something, and, when coupled with those of Clemens Alexandrinus (*Paedag.* iii. 3)—τῶν Ἑθνῶν οἱ Κελτοὶ καὶ οἱ Σκύθαι κομῶσιν, ἀλλ' οὐ κοσμοῦνται (κομποῦνται, see Cobet :) ἔχει τι φοβερὸν τὸ εὐτρίχον τοῦ βαρβάρου καὶ τὸ ξανθὸν αὐτοῦ πόλεμον ἀπειλεῖ—they carry some weight. Galen, however, in his treatise *Περὶ Κράσεων*, ii. p. 627 (vol. i. ed. Kuhn), classes "the whole Thracian and Scythian race" with the Celts and Germans on account of their resemblance to them in this very particular of the hair. Though, as Dr. Beddoe, to whom we owe this last reference, has remarked, there is no subject upon which statements are so likely to be misleading and erroneous as statements made by any but good observers provided with standards of comparison, upon differences in complexion and colour of hair, we nevertheless believe that Herr Hehn is right in thinking that dark hair is becoming more and light less common in our own latitude and day as it always has been in Italy, and we think there is good evidence for this which his particular line of research should have drawn his attention, to. Herr Hehn has in several places noted the singular fact that the useful invention of soap was due to the Northern and only adopted (and we may add, sparingly) by the Mediterranean races of Europe. He has not mentioned the fact that in many passages referring to this commodity it is said to have been employed "rutilandis capillis," for the procuring that flaxen-coloured coiffure which was fashionable in the later times of the Roman republic and under the empire, as it is at present in England. "Prodest et sapo," says Pliny, "Galliarum hoc inventum rutilandis capillis ex sevo et cinere." The Roman matrons, however, had employed wood ashes, the really efficient agent in the compound just mentioned, for this purpose long before Julius Caesar had subjugated the Gauls; for Valerius (ii. 1), writing in the time of Sulla, tells us that they "summa diligentia capillos cinere rutilabant." And light hair continued to be the fashionable, and, we submit, therefore, the less common, colour of hair down to the time of Tertullian at least; for he in his work *De Cultu* indulges in some ghastly mirth as to the evil omen which a flame-coloured head of hair might be taken to be as to the future life of the wearers who had taken so much pains to win it. The argument, that, if light hair is a thing which is fashionable, and for the procuring of which pains and trouble are laid out, it may be safely taken to be a scarcer thing than its opposite, will apply to the present day and to its

parallelism with the other centuries of which we have been writing.

English ladies who have hair of their own, though of the wrong colour, buy washes to make that colour "auricomous," "regardless of expense," as indeed they well might be if these washes, containing ordinarily simply nothing beyond chloride of lime, were priced at any price less than a thousandfold their intrinsic value; and to them Martial's line, xiv. 23—

"Caustica Teutonicos accendit spuma capillos"—

applies curiously. English ladies who have not sufficient hair of their own buy the natural hair of German women now as in the days when Ovid wrote—

"Jam tibi captivos mittit Germania crines,
Culta triumphatae munere gentis eris."

What was written in the time of Arminius and Varus will apply to the time of Moltke and MacMahon; Mr. Hulke, one of the surgeons to the Moorfields Ophthalmic Hospital, informing me that it is an ordinary thing to find the German female patients at that celebrated institution wearing wigs, their own hair being sold and doing duty at the opposite end of London. It may be said that these are but coincidences, curious and close enough, it is true, but merely coincidences for all that. To this it may be replied that a plague-spot is merely a coincidence also, but that it has its significance as relating to conditions which are more than skin-deep. Let our readers lay alongside of such a description of the dazzling and squandering season of 1872 as appeared in the *Daily News* of Monday, July 22, and of Mr. Gladstone's boast as to the "leaps and bounds" which our prosperity is making, Livy's description of the life and manners of Rome in the "seasons," with which he was only too familiar. It will be found in his *Praefatio*; a few words for it may end this article—"Nuper divitiarum avaritiam et abundantes voluptates desiderium per luxum atque libidinem pereundi perdendique omnia invexere." G. ROLLESTON.

The Philosophy of Shaftesbury. [*Die Philosophie des Grafen von Shaftesbury. Nebst Einleitung und Kritik.* Von Dr. Gideon Spicker, Privatdocent an der Universität Freiburg.]

DR. SPICKER'S book consists of a historical study rather singularly sandwiched between two expositions of the author's views on theology and philosophy: for though these latter are termed respectively "Einleitung" and "Kritik," they have scarcely the shadow of a relation to the central portion of the treatise. The connection suggested in the preface is that Dr. Spicker has taken Shaftesbury as his "Vorbild" both in matter and in form. But, in fact, it is hard to say whether there is a greater contrast between Shaftesbury's effort to establish rational theism as the crown and culmination of philosophic morality and Dr. Spicker's conviction that reason and religion have nothing to do with each other: or between the urbane irony and serene contemplation of the peer and the inconsiderate violence, grotesque humour, and emphatic indecorum of the Privatdocent. It is hinted that Shaftesbury, like Shakespeare, requires a German interpreter in order that his merits may be duly recognised by his fellow-countrymen; and no doubt a certain disposition to depreciate him may be found in other writers besides Mr. Lecky, whom Dr. Spicker quotes. On the other hand, our author is apparently unacquainted with Mr. Hatch's elaborate edition, in which Shaftesbury's opinions on all subjects are treated with the most serious and respectful commentation; more so, indeed, than the polished essayist sometimes deserves or would have desired. However, even supposing that the fame of Shaftesbury needed rehabilitation, Dr. Spicker does not seem particularly well qualified for the task.

He is not sufficiently acquainted with English philosophy to exhibit the originality and importance of Shaftesbury's ethical views; while the theological portion of his author's work he seriously misrepresents by rendering it in his own very different temper. A writer who claims (in the *Miscellanies*) that he has always "forborne to mention any holy mystery of our religion or any article of our faith" would scarcely approve of an expositor who metamorphosed his elegant innuendo into a direct and violent attack on Christianity, by the simple process of leaving out the irony which is the most entertaining and characteristic quality of his style. Sometimes Dr. Spicker vulgarises this into coarse sarcasm; sometimes he does not seem to have caught it at all. For example, he seems to take quite seriously Shaftesbury's reference (while advocating good humour in religion) to the "playsom humour" of David, as exhibited in the "famous high dance" performed by him in a state—as he carefully notes—of nearly complete nudity. Apart from the carefully studied and artistically effective expression, Shaftesbury's criticism of historical religion is scarcely worthy of much consideration at the present time. His knowledge was not extensive or profound, and his application of it shows all the unhistorical intolerance of the eighteenth century; as even Dr. Spicker sees, in spite of the vehement unfairness of his own anti-Christian polemic.

And generally speaking, though Shaftesbury's importance in the evolution of English ethical thought is very great, on other subjects he hardly fills the place that his expositor assigns to him. His philosophical talent was considerable, but its development was checked by his continual dread of losing the gentleman in the philosopher. A theory of practice, he thought, the most rigid rules of good taste and cultivated sense could not forbid; but in the purely speculative region, though he showed himself acute enough in casual criticisms, he was restrained from any serious pursuit of truth by his gentlemanly-practical contempt for the absurdities of metaphysical pedants. Thus it seems extravagant to speak of Shaftesbury and Leibnitz as *co-discoverers* of Optimism: as if Optimism remained to be discovered in the eighteenth century, and as if there could be any comparison between the loose effusions of the "Moralists" and the elaborate and ingenious reasoning of the *Theodicee*. And there is a similar inappropriateness in the following account of the Letter to Somers on "Enthusiasm":—

"Seit Plato, an den er sich unmittelbar anschliesst, hat keiner diese Leidenschaft so klar und gründlich erfasst und ihr eigenes Wesen durch eine Fülle von Thatsachen aus der Geschichte und Erfahrung entwickelt und bewiesen. Nicht umsonst hat er dieses Schriftstück . . . als Programm und Einleitung an die Spitze seiner Werke gestellt. Denn Moral, Kunst, Religion u. s. w. leitet er aus dieser Leidenschaft ab," &c.

Now Shaftesbury himself says of this composition, "The author cared not to grapple closely with his subject, nor to give us at once the precise definition of enthusiasm." And, indeed, here he does not appear exactly as a defender of enthusiasm: but rather as mediating between religious enthusiasts and polite society, which regarded their fanaticism as a malady needing severe treatment. He is chiefly concerned to impress on Somers and the public that a free play of raillery is the proper cure for this disease. Elsewhere no doubt he advocates more decidedly such temperate enthusiasm for beauty and virtue as he finds to be sanctioned by good taste and not incompatible with the character of a gentleman: nor would he exclude this exaltation from religion, provided its object be such a Supreme Being as a polite person in good humour feels himself disposed to recognise. But the resemblance between this attitude of mind and that of Plato is scarcely so close as either he or his expositor appears to think.

H. SIDGWICK.

Notes and Intelligence.

Geology.

The Glaciation of Patagonia.—Prof. Agassiz has forwarded to the superintendent of the U. S. Coast Survey a second report of the expedition in the U. S. steamer *Hassler*, of which he has the command. A great number of observations of very great value and interest are detailed in it, among others, a large mass of evidence supporting the theory of the glaciation of Patagonia. In one locality he found a pool containing live marine shells more than 100 feet above the level of the sea, showing a very recent rise in the land. He is inclined, however, to believe that the level terraces which Darwin took for raised sea-beaches are not so in reality, but are the denuded surfaces of the horizontal Tertiary deposits. The only evidences of upheaval met with by Agassiz refer to a period since the deposition of the Tertiaries, and while the shells now living already existed, without pointing to a rise by successive steps. The report is printed in full in the number of *Nature* for 11th July *et seq.*

Fossil Wood from the Lower Eocene of Herne Bay.—*The Geological Magazine*, No. 96, opens with an interesting article by Prof. Dyer on the fossil woods of the Lower Eocene of Herne Bay and the Isle of Thanet. The author describes and figures the microscopic features of the wood of a dicotyledonous tree, which exhibits the peculiar structure known under the name of *Fylose*.

Fossil Footprints in the Carboniferous Series of Canada.—In the same periodical, Mr. Selwyn, the director of the Geological Survey of Canada, notices the occurrence of some fine fossil footprints in a stratum of dark shale belonging to the Carboniferous series of Nova Scotia. These footprints are described and figured by Principal Dawson, who finds the principal footprints to be of two kinds: a large one resembling the form described by him as *Sauropus Sydnensis*, but having a strong claw on the fifth toe of the hind foot, that has left its mark strongly impressed upon the slab; and a smaller impression, sometimes trifid, but occasionally showing the marks of four or five toes. The former, which has been named *Sauropus unguifer*, he thinks may have been produced by *Baphetes planiceps*, the latter perhaps by a species of *Dendroperpeton*.

The Sand-pits, Mud-volcanoes, and Brine-pits of Yarkand.—At the meeting of the Geological Society on the 5th June, Dr. G. Henderson described some remarkable circular pits, occurring chiefly in the valley of the Karakash river. These pits vary in diameter from six to eight feet, and are from two to three feet deep, the distances between being about the same as it is across them. He explains their formation by supposing that water permeates the gravel at the head of the valley, and passes under a stratum of clay, which prevents it regaining the surface; after flowing in very varying quantities for irregular periods, it at length gradually washes away small portions of this clayey band, while the sand above runs through into the cavities thus formed, and produces the pits described. The mud-volcanoes of Tare Dab he considers to arise from the air contained in the water-bearing stratum after a fall of rain or snow becoming churned up with water and mud; it is ejected as a frothy mud, sometimes to a height of three feet. The brine-pits in the Karakash valley he attributes to the excessive rise and fall of the level of that river at various times; the water which fills the pits, unless replenished from time to time, becomes gradually concentrated by evaporation till a strong brine remains.

The Cambrian and Silurian Rocks of Jemtland.—The chief Silurian area in Sweden lies in the neighbourhood of Lake Storsjön, in Jemtland, and covers no less than 1920 geographical square miles. Dr. G. Linnarsson, of the Geological Survey of Sweden, describes this region in the *Geol. Fören. i Stockholm Förhandl.* vol. i. p. 34, and notes the striking fact, that the eastern and the western extensions of the Silurian formation of Jemtland exhibit a great lithological and consequently also a palaeontological difference. At places where limestones are prevalent, organic remains abound, and a comparison with strata of other parts of Sweden is consequently easy; but in the western extension of the Silurian rocks clay slates predominate which are utterly bare of fossils, so that it was only by means of a thin seam of limestone which bears Middle Silurian fossils he was able to trace the relationship with the other Cambrian and Silurian rocks. As regards their palaeontological characters, the Jemtland rocks bear a nearer relationship to the Norwegian than to the South Swedish Silurian formations. At several places large masses of metamorphic schist rest on the Silurian beds, but as they have not yet yielded any traces of fossils, their true relative age has not been ascertained.

The Fossils of the Cambrian Rocks of Oeland.—The Cambrian beds of West Gothland consist of sandstone and the so-called alum slate. According to Angelin and Linnarsson, the latter is characterized by two distinct faunas: the lower by *Paradoxides* and *Conocoryphe* species, and the upper chiefly contains *Olenides*. Up to the present time it was believed that in Oeland only the upper zone with *Olenides* was represented, but A. Sjögren has found below this stratum beds

which represent the lower division of the West Gothland alum shale, though differing in lithological character. It is a remarkable fact that this deposit, which has yielded several new species, is more nearly allied to the Bohemian primordial zone than to the rest of the Cambrian rocks of Sweden. (*Geologiska Föreningens i Stockholm Förhandlingar*, vol. i. p. 67.)

Geological Profile of the Central Chain of Scandinavia between Östersund, Sweden, and Levanger, Norway.—The rocks along this line are classified by A. E. Törnebohm according to their relative age in the following manner:—1. Primitive rocks and old granite. 2. Slate of Levanger and Cambrian quartzite. 3. Silurian beds; and 4. For the most part crystalline shales without fossils. These are of uncertain age, but they are probably not older than the Upper Silurian. (*Sueriges Geologiska Undersökning*, Stockholm, 1872, p. 24.)

Coniferous Remains from Solenhofen.—The *Geological Magazine*, No. 95, contains a paper by Prof. Dyer, in continuation of a former one on the same subject, on some remains of Conifers from the lithographic stone of Solenhofen. He describes a new species of *Pinus* (*P. Solenhofensis*), and gives a revision of the genus *Athrotaxis*, with description of two new species (*A. longirimens* and *A. laxus*), and a notice of a new genus, *Condylites*, probably belonging to the Cupressineae, and including a single new species, *C. squamatus*.

Flint Implements associated with Elephas primigenius in the High-terrace Gravels of the Thames Valley.—At the meeting of the Geological Society of London on the 19th June, Col. Lane Fox read a paper on the discovery of several flint implements which he found in association with *Elephas primigenius* and other extinct species of Mammalia. The author called attention to the presence of drift implements in the high terrace, their absence in the mid terrace, and their reappearance in the existing bed of the Thames; and noticed the great rarity or absence of animal remains in the high terrace, their abundance in the mid terrace, and the occurrence of both implements and animal remains at the bottom of the gravel in both terraces.

The Clay Deposits near Campbeltown.—Mr. David Robertson, at a recent meeting of the Geological Society of Glasgow, read a paper on the boulder-clay section near Campbeltown, which, contrary to its usual position in the west of Scotland, here overlies shell-bearing clay. The latter is dark grey in colour, and contrasts strongly with the overlying boulder clay, which is of a full reddish brown. The shell-bearing clay, as exposed in the bed of a little burn or streamlet in Tangy Glen, about six miles from Campbeltown, is seen standing up in the boulder clay like a little knoll, and has doubtless been brought to that form by abrasion. It can be traced for a distance of 60 or 70 yards; and though its exact depth could not be ascertained, as the rock is seen at a short distance on either hand, it probably extends only a few feet below that which is exposed. The boulder clay overlies it to a height of 50 or 60 feet. The latter consists of 50 per cent. of fine mud and 50 per cent. of sand and gravel, while the shell-bearing clay gives 80 per cent. of fine mud and only 20 per cent. of sand and gravel. The fossils are sparsely scattered through this deposit—Molluscs in particular are comparatively rare, the few found being chiefly *Leda pygmaea* with an occasional *Leda pernula* and a few fragments of other species. Ostracoda and Foraminifera are better represented, eighteen species of the former and twenty-six of the latter having been obtained. A remarkable feature of the Ostracoda in this deposit is that they have much in common with those found in the clays on the east coast of Scotland, which have been held to represent more purely Arctic types than those generally found in the west. Amongst these are *Cythereopecteron Montrosiense*, *C. vespertilio*, *C. Sorbyana*. An upper bed, dipping to the river only, contains the more recent forms common to our raised beaches and present seas. It may be stated that *C. vespertilio* and *C. Sorbyana* are common species in the clays of Norway.

The Structure of the Cordillera de los Andes.—Dr. Maack, who was in charge of an expedition to explore the Isthmus of Darien in order to ascertain whether the Napipi road would offer advantages for an inter-oceanic canal, has found that the Cordillera de los Andes province of Chocó, New Granada, has features which distinguish it from the rest of the range. Throughout the whole of South America the general strike is from south to north, but in this province it changes to from east to west. The Cordillera of the isthmus consists of several rock systems; no high and wide tableland accompanies it as has been observed in the South and Central American Cordilleras, and it belongs altogether to a far more recent period, being contemporaneous in short with the eruption of basalt and trachyte. (*Boston Daily Advertiser*, 4th Nov. 1871.)

The Geology of the Argentine Republic.—According to Dr. G. A. Maack, the great La Plata plain chiefly consists along its western border of alluvial deposits from one to two feet in thickness, and generally formed of a fine brown or grey silt "Pampa sand," made up for the most part of Diatomaceae, and in the neighbourhood of rivers some still living freshwater shells. This covers the diluvium, the real Pampas formation ("formation pampeña" of d'Orb. "Pampean mud" of Darwin). More or less red in colour, and attaining a thickness of

10 to 60 feet, it consists of sand and clay and in some parts limestone in so-called "Tosca concretions," and is remarkable for its "Lagunas" or "Salinas," and the gigantic remains of *Megatherium*, *Myiodon*, *Glyptodon*, *Toxodon*, &c. The basis of this Pampas deposit is formed by Tertiary beds, which d'Orbigny divided into a *système guaranien* and *système patagonien*. To the former may belong the lignite beds of Rio grande do Sul, in Brazil. The latter group is best developed in the neighbourhood of Paraná, and near Vitorias, in Uruguay; its chief fossils are *Venus Münsteri* and *Ostrea patagonica*; and the formation may be ranked beside the Swiss molasse. Tertiary beds are found at a depth of 280 feet at Buenos Ayres, whence they seem to extend right away to the base of the Cordilleras. Other sedimentary rocks are unknown in the Pampas, though the older Plutonic rocks are met with at isolated spots. (*Proc. Boston Nat. Hist. Soc.* vol. xiii. 417.)

Zoology.

We have received three parts (Nos. 4-6) of the *Illustrated Catalogue of the Museum of Comparative Zoology at Harvard College*:—No. 4 is intitled "Deep-Sea Corals," by L. F. de Pourtales (pp. 93, with eight plates). The corals described in this paper were collected in the years 1867-9, during the expeditions made by the United States Coast Survey for the exploration of the Gulf Stream, and more particularly that part of its course known as the Straits of Florida. The greatest depth at which the dredge appears to have been used is 853 fathoms, between Key West and Havana. The families having apparently the greatest range in depth are the *Oculinidae*, *Stylasteridae*, and *Milleporidae*, and about fifteen species are considered to be characteristic of the rocky bottom at greater depths than 100 fathoms. The explorers found, moreover, that the Gulf Stream, as far, that is to say, as they examined it, extends to the bottom, and is not underlaid by a cold arctic current running in an opposite direction, as has sometimes been assumed to account for the low temperature at the bottom. Mr. H. Mitchell, assistant on the United States Coast Survey, proved experimentally that the Gulf Stream has a nearly uniform velocity in those straits, and a constant course for a depth of 600 fathoms, although its temperature varies 40° Fahrenheit in this depth.—No. 5 is intitled "The Immature State of the *Odonata* (Part I.: Sub-Family *Gomphina*)," by L. Cabot (pp. 17, with three plates). The larvae of seventeen species are described, but only four are identified and placed beyond any doubt; all the others are determined by exclusion or supposition, and some of them more or less doubtful.—No. 6 is a "Supplement to the *Ophiuridae* and *Astrophytidæ*," by Th. Lyman (pp. 18, with two plates), in which some of the Ophiurians procured by deep-sea dredging in the Straits of Florida, as well as a few other species from shallow water, are described.

Syrnantes paradoxus in Scotland.—This remarkable Asiatic bird, a sudden irruption of which occurred in Germany, Holland, and more particularly in Great Britain during 1863, and which is commonly known by the name of Pallas's Sand-grouse, has made its appearance again this year, four of them having been seen on the 25th and 29th of last month near Girvan, in the west of Scotland. It is at present uncertain whether these birds are fresh arrivals or descendants of the individuals which immigrated in a previous year.

Two New Sponges from the Philippine Islands.—The British Museum has just received two new genera of Sponges that were discovered by Dr. A. Bernhard Meyer at Cebu, the island in the neighbourhood of which the beautiful *Euplectella* occurs. One of these sponges, named by Dr. Gray *Meyerina claviformis*, is, indeed, allied to, but still more beautiful than, *Euplectella*; it is 18 inches long, in shape like a cucumber, is slightly bent upon itself, and, whether regarded in its several parts or its entirety, must unquestionably be ranked as the most exquisite of sponges. The second, named by Dr. Gray *Crateromorpha Meyeri*, is of very different form, being goblet-shaped, and consisting of a globular, hollow body supported by a contracted stem. The globular part is 3½ inches wide, and the stem 3½ inches long. Both these sponges are marine, and grow erect in sandy mud. (*Ann. and Mag. Nat. Hist.* July and August.)

The First Dredge.—To Otto Friedrich Müller belongs the honour of having invented the dredge. The Zoological Museum at Cambridge, U.S., possesses in its library the copy of Müller's *Zoologia Danica* used by Tilesius during Krusenstern's voyage round the world in the beginning of this century. Tilesius, among many interesting remarks written on the fly-leaf, mentions the dredge invented and used by Müller, and represented in the vignette of the title-page. He purchased it on his passage to Copenhagen in 1803 of Vahl, Müller's collaborateur, and used it occasionally during the voyage, though, as he admits, not often, as he required the assistance of several sailors to work it, the rope alone weighing eighty pounds. On his return, the dredge was deposited in the collection of the Academy of Sciences of St. Petersburg.

The Colours of Insects.—Under the heading of "Mimicry in the Colours of Insects," Dr. H. Hagen contributes a very interesting paper

to the July number of the *American Naturalist*. He states that the colours of insects are of three distinct kinds, viz. colours produced by interference of light, colours of the epidermis, and colours of the hypodermis. Colours due to interference may be produced in two different ways: either by thin superposed lamellae, as in the wings of Diptera and Neuroptera, or by many very fine lines or striae in very near juxtaposition, as in *Apatura* and other colour-changing insects; these colours are only optical phenomena, and differ in this respect from both of the other kinds. The epidermal colours belong to the pigment deposited in the cells of the chitinated external skin or epidermis. They are mostly metallic blue, green, bronze, golden, silver, black, brown, and perhaps more rarely red. They are very easily recognised, being persistent and never obliterated or changed after death. The hypodermal colours are situated in the non-chitinated and soft layer called the hypodermis by Weismann. They are mostly brighter and lighter, light blue or green, yellow, milk-white, orange, and all the shades between. The hypodermal colours in the body of the insects fade or change, or are obliterated after death. The hypodermal colours are very often different in males and females of the same species; the epidermal colours rarely differ. The hypodermal colours may change or be altered in some way in a male or female during its lifetime by sexual or other influences; the epidermal colours never change; the so-called "mimetic" colours are probably hypodermal. The hypodermal colours appear to be due to a kind of photographic action; the epidermal to a chemical process of combustion or oxidation.

Distribution of Land Molluscs in the Sandwich Islands.—Mr. John T. Gulick contributes to *Nature* for July 18 some new and curious particulars respecting the distribution of a group of *Helicidae* known as the *Achatinellinae* in the different islands of the Sandwich archipelago. The group is characterized by a spiral twist of the columella, generally so strongly developed that the columella seems to be armed with a lamellated tooth revolving within the shell, and is peculiar to the Sandwich Islands. It consists of several genera, most of which are confined to a single island. A remarkable development is found on Oahu, an island sixty miles long, with an average breadth of about fifteen miles, on which are found no fewer than about 185 *Achatinellinae*, all, with only one or two exceptions, peculiar to the island. Nearly all the species are confined to the forest regions skirting two ranges of mountains, about forty miles long by five or six wide; and even here no one of the species is distributed over even one-half of this small mountain range, being mostly restricted to areas of from one to five miles in length. Each mountain valley has its own varieties, and in many cases its own species; and the same remarkably restricted distribution of species is found in the other islands of the group. Nearly all the species of one genus found on one mountain range are connected by varieties presenting very minute gradations of form and colour. Species of the same genus on different islands are not so completely connected by intermediate forms. The degree of difference between the several species of the same group is in proportion to their separation in space. Nearly allied species, occupying neighbouring localities, pass from one to the other by all the intermediate gradations of form and colour, while those whose homes are separated by a distance of eight or ten miles cannot be connected by minute gradations without bringing in some of the forms occupying the intermediate territory. Mr. Gulick is however unable to account for these differences by natural selection, survival of the fittest, or any other theory. The conditions under which the allied species live are so completely similar that it does not appear what ground there can be for difference in the characters best fitting the possessors for survival in the different valleys in which they are found. The ground species are mostly dextral, while the arboreal species are chiefly sinistral, though this rule is not without exception.

Physics.

Earthlight on the Moon.—Prof. Shaler, of Harvard, who has devoted considerable attention to the appearance of the new moon when illuminated by the light of the sun-lit earth, has communicated his observations to the *Philos. Magazine* for August. With the 15-inch Mertz of the university observatory it is possible to see all the principal features of the topography of the dark region illuminated only with this earthshine. The eye is unable to recognise the craters by light and shade, the light being too feeble, besides being too vertical; the relief is due to the difference in the light-reflecting power of the various features of the topography. Whatever becomes very brilliant under the vertical illumination of the full moon shines out with a singular distinctness when lit by our earth's light. When the moon is not over twenty-four hours old, she is at her best for observation. The author was able to recognise nearly all the craters of the darkened part that are over fifteen miles in diameter, and probably one-half the bands which show with a power of 100 when the moon is full.

The Atmospheres of the Fixed Stars.—The first annual report of the observatory of Bothkamp, edited by H. C. Vogel, the director,

contains very important results, which extend our knowledge of the branch of astronomical science that Miller and Huggins may be said to have founded. The following red stars were examined: α Orionis, α Herculis, β Persei, and R Leonis Minoris, and gave spectra that agree perfectly in exhibiting a series of broad dull absorption bands having sharply defined boundaries on the side next the violet. In the spectrum of α Orionis (*Betelgeux*) many lines were measured and compared with those in Ångström's atlas of the solar spectrum, and the presence of sodium, calcium, magnesium, iron, and bismuth, determined with a high degree of probability. The presence of hydrogen is uncertain, for in that portion of the stellar spectrum which should be occupied by H β , the second hydrogen line, a dim band only is observed, and H α and H γ are altogether absent. The lines of α Herculis conclusively indicate the presence of sodium, magnesium, and iron, and probably that of calcium and tin. The spectrum of another red star, α Bootis (*Arcturus*), differs greatly from those of the four above mentioned. It contains, in the place of bands, several sharp lines that could be measured with great exactness, and resembles most nearly the solar spectrum, but is distinguished from it by certain lines between D and b , not present in the sun, and by a dearth of lines in the red and blue. H α and H β were detected with difficulty, and H γ not at all, only a dull dark band being seen near G. A comparison with the lines of typical spectra was more easily made than in the case of α Orionis, and the presence of hydrogen, sodium, calcium, magnesium, iron, and chromium determined with certainty, and that of barium, manganese, and silver rendered highly probable. Though in the brilliant spectrum of Sirius the hydrogen lines are astonishingly prominent, the groups of lines are otherwise so weak that it is only possible to recognise with certainty the two sodium lines D and the magnesium line b . The spectrum of the variable star β Lyrae is peculiar in having a continuous ground on which bright instead of dark lines are seen. Of three more striking than the rest, one near the D line is the most intense, a second is on the boundary of the blue, and the third a little short of G. The positions of the three were determined with great accuracy, and their values in wave-lengths are: 5875, 4859, and 434, the limit of error being within 0.2 millionths of 1 mm. The first line is rather more refrangible than D, and agrees with the one, usually termed D $_2$, first noticed in the protuberances; the two others are hydrogen lines. Besides these, other bright lines were seen, one lying between D and C, the other probably being b of the solar spectrum, and corresponding with magnesium. (*Der Naturforscher*, No. 27.)

The Meteoric Shower of 30th April—1st May.—This meteor stream, the apparent position of whose radiant point is found by Schiaparelli to be in the Northern Crown, R.A. 237°, N.P.D. 55°, and which has also been recognised by R. P. Greg, was, according to D. Kirkwood (*Amer. Jour. Science*, July, 52), a more conspicuous object in earlier times. Meteoric displays are recorded by Quetelet to have occurred on this day, A.D. 927 and A.D. 934, and it is considered by the author that this stream of meteors may be connected in its origin with the comet which passed its perihelion about the 29th April, B.C. 136.

The Altitudes of Aurorae.—A paper on this subject in *Pogg. Ann.* No. 5, contains the results of observations of the aurora of the 4th February, made by Galle and Reimann, at the observatory at Breslau. Fourteen determinations made independently by these observers indicate a mean height of fifty-five geographical miles for the auroral rays. It appears probable that light is developed at even a less altitude than this, at forty miles, or what is practically the limit of the atmosphere, where, according to the observations of Liais, in Brazil, the last traces of reflected sunlight are to be detected, and the ignition of meteors is assumed to occur. The magnitude of the rays was not determined, but they are believed by these observers to have an average length of forty miles.

The Electrical Condition of Gas Flames.—Prof. Trowbridge, of Harvard, publishes a paper on this subject in the *Amer. Jour. Science* for July, page 5. He finds—1. That the flame of a Bunsen burner is negative while positive electricity accumulates on the burner itself, if it be a good conductor; when made of non-conducting material, no charge is noticed at the top of the flame. 2. The stratum of air in contact with the outer cone of flame is slightly charged with positive electricity, the partly consumed gas of the inner cone being neutral. 3. The presence of flames tends to change the nature of the atmospheric electricity at any given place, reducing a positive tension to a feebly negative one. As the electricity of air during cloudy and rainy weather is generally negative, or at the most feebly positive, the author considers that his observations in some degree warrant the popular idea that great fires are followed by a change in the atmosphere inducing rain.

The *Bulletin de l'Acad. royale des Sciences de Belgique*, No. 3, has a paper by J. C. Houzeau on a ready method of calculating lunar phases. It is especially intended for the use of students of history, and, with the help of the four tables appended to it, enables them to perform calculations of this kind with ease.

New Publications.

- ABBOTT, C. A. *The Stone Age in New Jersey.* Salem (Mass.): Peabody Academy of Science.
- ANNUAL RECORD of Science and Industry for 1871. Ed. by S. F. Baird. New York: Harper and Brothers.
- ARBEITEN aus dem zoologisch-zootomischen Institut in Würzburg. Herausg. von C. Semper. 1. Heft. Würzburg: Stahel.
- BASTIAN, H. C. *The Beginnings of Life.* Two vols. Macmillan.
- BONNISSENT, M. *Essai géologique sur le Département de la Manche.* Paris: Savy.
- BREFELD, O. *Botanische Untersuchungen über Schimmelpilze.* 1. Heft. Leipzig: Felix.
- EGLSTON, T. *Lectures on Mineralogy,* delivered at the School of Mines, Columbia College, New York.
- FAYER, J. *The Thanatophidia of India: being a Description of the Venomous Snakes of the Indian Peninsula; with an Account of the Influence of their Poison on Life, and a Series of Experiments.* Folio, with Coloured Plates. J. and A. Churchill.
- HAECKEL, E. *Natürliche Schöpfungsgeschichte.* 3. Auflage. Berlin: Reimer.
- KINGSLEY, C. *Town Geology.* Strahan.
- KOCH, L. *Die Arachniden Australiens nach der Natur beschrieben und abgebildet.* 5. Lieferung. Nürnberg: Bauer und Raspe.
- PIETSCHMANN, W. *Der Photometer.* Leipzig: Scholze.
- ROSENTHAL, J. *Zur Kenntniss der Wärmeregulierung bei den warmblütigen Thieren.* Erlangen: Besold.
- ROSS, J. *The Graft Theory of Disease.* Churchill.
- WESTERLUND, C. A. *Sveriges, Norges och Danmarks Land- och Sötvatten-Mollusker.* 1. Land-Molluskerna. Lund.

Philology.

The Nominal Suffix *ya* in Indo-Germanic. [*Ist in der indogermanischen Grundsprache ein nominales Suffix *ia* oder statt dessen *ya* anzusetzen?* Von Theodor Benfey.]

The Origin and Forms of the Indo-Germanic Optative. [*Ueber die Entstehung und die Formen des indogermanischen Optativ (Potential), so wie über das Futurum auf sanskritisch *syāmi* u. s. w.* Von Theodor Benfey.] (Publications of Göttingen Scientific Society.) Göttingen: Dietrich.

PROFESSOR BENFEY has reprinted these two papers from the *Transactions of the Göttingen Gesellschaft der Wissenschaften*. Their titles are not ambitious: but the importance, at least of the second paper, for comparative grammarians is very considerable. In both of them is clearly seen the writer's acute and many-sided intellect: whether we agree with them or not, we learn from them.

The first (which in one way is introductory to the second) aims at proving that a nominal suffix which has played an important part in Indo-European languages had for its original form *ia*, not *ya*, as all philologists had hitherto believed: in other words, that it was a dissyllable, not a monosyllable—a circumstance which of itself raises a presumption against the new view, when we remember the undoubted antiquity of the suffix. The new evidence is the occurrence in the Vedas (clearly shown by Professor Benfey) of both the monosyllabic and dissyllabic form of the suffix, whereas in classical Sanskrit, as is well known, the former alone occurs. Which form is more frequent in Vedic writings is not certain; nor, indeed, is it material: the dissyllabic form is found there abundantly; and occurs also in Pāli and the Prakrits. Which form was the older? The professor argues from the general improbability of so extensive a diaeresis of *ya* into *ia*, in default of parallel cases, and from the special improbability of so exceptional a change in Sanskrit, where the general tendency is to avoid hiatus: from the regular process of the formation of words, to wit, the meeting of open vowels in the amalgamation of the component parts; which vowels are at first pronounced distinctly, afterwards phonetic change occurs in order to avoid hiatus: from some indications given by the Sanskrit

accentuation; and, lastly, from the fact that the suffix undoubtedly appears as *io* in Greek and *io* in Latin. From these arguments, but more especially from this agreement of the three languages, whose records are much the oldest which we possess, he concludes that the original form of the suffix was *ia*, which afterwards, in the Asiatic and North European languages, passed into *ya*.

Professor Benfey's argument undoubtedly disturbs the quiet possession of the received theory. Yet there is something to be said for that too. The agreement of the three languages—Sanskrit, Greek, and Latin—would be much more striking if the two last had possessed the *y*-sound: the few cases where it seems to occur in Latin, e.g. *Pompeius*, are scarcely to be regarded. Greek and Latin could not change from *i* to *y*: the other languages, which had both sounds, could change as easily from the one as from the other. The solution, therefore, of the question in favour of *ya* rests not merely (as Professor Benfey says) on a numerical preponderance in its favour, which would certainly not be conclusive: the nature of the evidence on the two sides is different: the evidence which can be drawn from Greek and Latin is much less conclusive. Further, it seems to me hard to separate the history of the nominal suffix *ya* from the verbal suffixes—formative and inflectional—of the same form: nor, I think, does Professor Benfey altogether wish to do so. But the manifold forms which the formative *ya* takes in Greek become in this way very unintelligible. Once derive them from a sound which the Greeks could not pronounce, and therefore endeavoured in many different ways to avoid, and all is plain. But why should there be such variety from original *ia*, a combination to which the Greeks had no objection? Lastly, the occurrence of *ia* beside *ya* in Vedic undoubtedly is easiest to understand on the professor's hypothesis—that *ia* was original, but began to pass into *ya* in the age of the Vedic hymns (both forms then existing), and was altogether lost in the classic period. But the very theory by which he explains the curious occurrence of both forms in the same literature may help us to understand how *ya* could pass for a time and to some extent into *ia*, and yet be fully re-established again. The Vedic language, Professor Benfey says, is an artificial language—derived, indeed, but yet quite distinct, from the popular speech. I quite agree: and is it not just in such a language as this that an artificial diaeresis might be expected?—a diaeresis which never established itself in the popular speech, which retained the original sound *ya*. I do not think that we should expect Vedic peculiarities of the sort to pass into the popular Sanskrit. Professor Max Müller's remarks on the license of pronunciation allowed in the Vedic hymns (*Rig-Veda-Samhita*, vol. i. preface, p. lxxvi) seem to me pertinent here.

The second paper before us is an enquiry into the origin of the optative. In this enquiry is involved a larger question—as the professor points out—whether the principle originally laid down by Bopp, that such formations were compounded out of pre-existing words, not roots, or at all events out of a root and a word, is to be still maintained, as against the newer theory, that the changes of meaning in the moods were expressed by the insertion of probably pronominal roots. Bopp held that the optative-suffix was *ya*, formed from a root *i*, “to wish,” with the suffix *a*: from this primary sense of wishing he thought that the other powers of the optative could be deduced. Professor Benfey adopts this view, with modifications designed to meet one or two difficulties in it. The first difficulty is the assumption by Bopp of the special Sanskrit phonetic law (by which *i* + *a* became *ya*) in order to get the ground-form applicable to all Indo-European languages. To this difficulty, which is

considerable though not fatal, because *i* might have passed into *y* in Indo-European (which possessed both sounds) and then been reinstated in Greek and Latin, Professor Benfey adds an objection to the insertion of *ya* before the personal endings. I do not understand Bopp as necessarily maintaining such an insertion: it is contrary to his principle above stated: but undoubtedly Benfey's objection to the insertion of such verbal roots is supported by all analogy. His own view is that the optative forms (which are three in Sanskrit and more in Greek) do not spring from one common origin—but from different tenses of a verb *i*, "to wish," which he agrees with Bopp in looking on as the radical idea of the mood. These tenses are the present and imperfect—indicative and conjunctive—both of the simple verb *i* and of the same verb as a base with a suffix *a*. From the imperfect of the simple verb *i-am* (*i-m*), *i-s*, *i-t*, &c. we get the Sanskrit forms of the first conjugation (*bharyam*, *bhāres*, &c.), the Greek ordinary forms (except the first person *φέρομι* in common use, but the archaic first person) *φέρο-υ*, *φέρο-ις*, &c., and the Latin futures *feres* (for *fera-is*), &c. The other usual forms he gets from the imperfect conjunctive of the base *ia*, i. e. *iām*, *iās*, &c.—which give the Sanskrit forms of the second conjugation *-yām*, *-yās*, &c., the Greek *-ην*, *-ης*, &c., the old Latin *-iēm*, *-iēs*, &c. (e.g. in *siem*), and the Gothic *jau*, *eis*, &c. The middle voice of the Sanskrit is the imperfect indicative middle of the simple verb, *i-ma*, *i-sa*, &c.—but, it must be confessed, with some strange changes of termination. Other Greek forms are ingeniously fitted into their respective holes: *φέρο-μι* is the indicative present of the simple verb—meaning simply, "I wish to bear": forms like *τύψαια*, *τύψαιας*, &c. are given to the imperfect of the base, *iam*, *ias*, &c.: the Homeric conjunctives *θείης*, *μεθε-ίης*, &c. are present conjunctives of the base; *δαμείω* is the base present either conjunctive or indicative; *θε-ίο-μεν* is the indicative either present or imperfect: lastly, the indicative present, *i-ā-mi*, *i-a-si*, &c., when attached to the root *as* (*es*) "to be," gives the future; in Sanskrit *-syāmi*, in Greek *-σω* through *σιω*, and in Latin *ero* for *es-io*.

All this is extremely ingenious, and holds together well. There is nothing improbable in this application of many forms to denote one category: on the contrary, it is in accordance with all we know of the principles of language. I wish to point out some difficulties in the theory; but I fully recognise that Professor Benfey has made out a very fair case with the evidence he has to deal with: he candidly lays claim to no more.

In the first place, it seems quite impossible to prove that the vowel *i* was ever long in the optative of either Greek or Latin. In *siem* it was short, and the Greek admits of no proof either way. Professor Benfey seems to recognise the difficulty at p. 9, where he speaks of *oi* becoming *oi* in Greek, and gives *κοίτη* from *ki* as an instance. But there is no proof that the root *ki* was long in Greek: I believe it to have been short in Graeco-Italian, as shown by Latin *quies*, &c. But it is essential to any establishment of the professor's theory that it should be proved to be long, or at least to show some traces of its having been so: for otherwise the sense "to wish" falls to the ground. Indeed there is but unsatisfactory proof for this root. Professor Benfey regards it as = *i + i*, the intensive of *i*, "to go," in the sense of applying to a person, requesting, wishing: then from wishing, he devises a transition through possibility to potentiality, in order to account for all the meanings of the verb. Now it does not seem easy to establish the sense of wishing for *i* even in Vedic: in common Sanskrit the sense does not occur: and Professor Benfey himself has some excellent remarks (p. 21) on the fact that in a living language a word never really has too distinct senses at the same time: it has

one sense, though under special circumstances it may be applied to express another: and consequently it is improbable that *i* should really have had the special sense of wishing, here assumed to be so old, when it actually means "to request" in Vedic. In Greek and Latin we find no *i*; we have *ζ*, "to go": the Greek *ίότης* and *ζμερος* may point to a secondary root *is* with the desired sense: the nearest form is the Homeric *ίέμενος*, which exactly corresponds to the Vedic *iyamāna*; but too much dependence must not be placed on the length of the vowel here: it is short in *ιενται* (*Od.* xxii. 304); and cases like *ἀθάνατος*, *ἀπονείσθαι*, &c., where a short vowel is artificially lengthened when followed by two or three others, are too common in Homer for us to feel certain about this one.

In the next place, does the syntax of the different languages, in which the mood occurs, countenance the view that "wish" (or "power") was the primary sense of the subjunctive? In Latin the mood was absorbed into the subjunctive; but this very absorption points to a similarity of function and origin. In Sanskrit, it seems in the main conditional: but here we must wait for fuller information on the most important subject of Vedic syntax from Professor Benfey himself. When, however, in classical Sanskrit we find (e.g. *Nala*, i. 30) *viśiṣṭāyā viśiṣṭena saṅgamo guṇavān bhavet*, we seem to have a perfectly parallel usage to the Homeric (e.g. *Od.* iii. 231) *ῥεία θεός γ' ἐθέλων καὶ τηλόθεν ἄνδρα σώσσει*: that is to say, a direct statement differing from the indicative only by the introduction of more or less uncertainty; the statement of a conception, not of a fact. Now this usage is frequent in Homer; in Attic Greek it is hardly traceable: while the sense of wishing, and of potentiality (with *ἄν* or *κέν*), are comparatively rare in Homeric Greek, but fully established in Attic. This surely does not point to wishing as the primary sense of the mood. Again, it is well known that the subjunctive and optative are used in Homer to express the same kind of idea, only with different degrees of certainty. In the line, *ἄλλον κ' ἐχθαίρησι βροτῶν, ἄλλον κε φιλοίῃ* (*Od.* iv. 692), the optative is no whit more potential than the subjunctive. So far as sense goes, I can see no reason for treating the optative as a different kind of formation from the subjunctive. I do not know whether Professor Benfey would now form that mood on the same principle as his optative: but in his excellent *Kurze Sanskrit-Grammatik*, while confessing doubt on the matter, he seems to acquiesce in the usual explanation of the *a* of the subjunctive, namely, that it is an inserted element adding uncertainty to the verb. Now if this explanation is the best that can be given for the subjunctive suffix *a*, why should it not be tenable for the optative suffix *ya*? It seems to me that the received view is internally probable, by which both *a* and *ya* are regarded as demonstrative roots: I hold to the opinion that the relative sense of *ya* is later. In this explanation we have the analogy of the augment to help us: only the same element is attached to a different portion of the word, naturally to avoid confusion. I take the steps to be these: *φέρει(τ)* = "he bears," *φέρη(τι)* (with the inserted *a*) = "he bears there" = "he bears not here but elsewhere" = "his bearing is present to the mind only" = "he may be conceived of as bearing." The same explanation holds for the optative, probably a later formation and possibly to denote greater remoteness. Hence the subjunctive, as giving the nearer event, can be used to express greater probability: also as dealing with an object near at hand it gets its well-known usages to express doubt and questioning with reference to immediate action. The optative, on the other hand, as formed by the stronger suffix, can express a greater degree of uncertainty, a more remote consequence, and a wish, realised as a mere conception.

It is, no doubt, a strong point against this theory that it gives no explanation of the almost universal change of *ya* to *yā* in this suffix. The long *a* before *m* in the Sanskrit first person singular and plural may be explained by the nature of the following sound—compare the extraordinarily disproportionate number of lengthenings before *μ* in Homer—and the dual *-āva* may have followed on analogy. But no physiological reason, so far as I know, can be assigned for lengthening a vowel before *s* or *z*. This difficulty then must be admitted.

JOHN PEILE.

China's Place in Philology. An Attempt to show that the Languages of Europe and Asia have a Common Origin. By Joseph Edkins. Trübner, 1871.

THE first part of the problem alluded to in this title, China's place in philology, is certainly one of the most interesting and important of linguistic questions; and no one can be better qualified to answer it than Mr. Edkins, whose knowledge of Chinese and its dialects is at once extensive and accurate. But instead of restricting himself to this first part of the subject and investigating the phonetic and grammatical forms of Chinese in connection with other monosyllabic languages (Annamese, Siamese, Burmese, and Thibetan), the author descends from the scientific to the theological level by attempting to prove that the languages of Asia and Europe proceed from a common origin. Even if this could be done—and in the attempt the principal question is made to appear of secondary importance—we are at a loss to imagine what the author supposes himself to have gained thereby; for his object, as his theological attitude plainly shows, is to prove the unity of *all* races, and for this it would have been necessary to adduce the languages of Africa and the New World, which he entirely omits to do. Apart from this error, into which a philologist of the nineteenth century ought scarcely to have fallen, the method followed in his work is not exactly on a level with the present standard of scientific enquiry. Mr. Edkins fares no better than Xylander in his well-known book, *Das Sprachgeschlecht der Titanen*, when he allows himself to compare Chinese and Mongolian words with Greek and Sanskrit ones, and Thibetan with Hebrew, without considering the possibility of the origin suggested in each individual case. Thus before investigating the formal or phonetic elements with sufficient accuracy, he lays hold on certain morphological or syntactical coincidences, which, as is well known, can only be relied upon when the first two points have been already cleared up.

The author's observations in chap. iv. on the origin of language were evidently written in ignorance of the labours of Steinthal and L. Geiger, a pardonable circumstance considering his residence at Peking; but some of the views which he imparts are such as even a theologian—in Darwin's native land—ought not to introduce into a work of scientific pretensions.

We fail to see how the enquiry into China's place in philology is furthered by the author's declaring the Chinese to be "Hamites who migrated eastwards before the building of the tower of Babel," for certainly no philologist would take such a statement upon faith, and to those who would, the whole question is a matter of indifference. The author is also in error in maintaining, in the beginning of the seventh chapter, that the Himalayan languages are more modern than Chinese; on the contrary, according to the latest researches, they as well as the other monosyllabic languages belong to a much older phase of phonetic development than Chinese.

In spite of these defects, to which must be added the numerous inaccuracies in transcription of Indo-Germanic and

Semitic words, the book contains many valuable remarks upon the languages of Upper India; and especially the greater part of what the author communicates from the rich stores of his sinological learning is at once new and of the highest interest for philologists.

FRIEDRICH MÜLLER.

A Grammar of the Urdu or Hindustani Language.

By John Dowson. Trübner.

THIS grammar belongs to the best sort of those intended for practical use and convenience. It gives all the grammatical materials and the rules of syntax with completeness and brevity, which should make it fully answer the purpose for which it is intended.

There is however one essential defect which it shares with all the Urdu grammars that have hitherto appeared, that of ignoring the importance of comparative philology. When it is found that languages of older formation such as Latin, Greek, or Gothic, cannot be thoroughly understood without applying the comparative method and assimilating the results of modern philology, the same must be even more certainly the case with a quite modern language such as Urdu, which is more nearly parallel to the Romance dialects. Just as it is impossible to obtain a really scientific insight into any of the Romance languages without reference to Latin, so it is impossible to comprehend any form in Urdu, which belongs to the linguistic treasury of India, without recurring to Pali, Prakrit, and Sanskrit. And that this is not a matter of indifference even to the practical student appears from the rule discussed on p. 113, "The Agent Case," which, as the author himself observes in the preface (xiii), can only be understood by the help of Sanskrit.

The scientific study of the languages of modern India is especially incumbent on English scholars; no one in Europe has so close a concern with these languages, which possess a rich popular literature, and it may even be hoped that Sanskrit literature will be enriched and supplemented by their study.

As much unexpected light was thrown by the Romance languages upon the history of Latin (cf. Schuchardt's excellent work), certainly a profounder study of the new Indian dialects would explain many obscurities in Sanskrit. The Sanskrit lexicon, in particular, which at present, like the Arabian, contains an amalgamation of the most discordant elements, might be thoroughly sifted, and dialectic differences certainly would come to light as the popular languages were investigated. But to attain this result, the matter must be viewed from different sides, and in the first place a zeal for the scientific study of the popular dialects must be awakened.

FRIEDRICH MÜLLER.

M. SHAPIRA.

TO THE EDITOR OF THE ACADEMY.

SIR,—In the *Athenaeum* of to-day there is a letter, dated Jerusalem, July 24, 1872, and signed "H. J.," which gives an account of "the excavations in search of antiquities in Moab, which are being carried on under the auspices of M. Shapira," and which "have proved surprisingly successful." Allow me to repeat the warning which I gave in a recent number of the *Academy*. There was shown to me some weeks ago, at the British Museum, a drawing of the top of a pillar, sent home by M. Shapira. On it were figures of animals and an inscription, partly in Phoenician and partly in Nabathean characters. The authorities at the Museum seemed to have little doubt that the whole thing was a forgery.

That the Count de Vogüé should have secured a fine Phoenician inscription of fifteen lines, dug up at Beirut, is a matter of congratulation.

W. WRIGHT.

Cambridge, August 10, 1872.

Intelligence.

The experiment which is being tried at Zürich, of admitting women to the ordinary academical course, is attracting considerable attention in France and Germany as well as in England, especially in view of the sudden increase (from seventeen to fifty-one) in the number of such students which has taken place this year. A very well informed writer in the *Allgemeine Zeitung* (July 23, 25, 26) represents the professors as entirely satisfied with the results at first obtained; but it appears that some of the latest comers (chiefly Russians) are imperfectly prepared for the university course, and to guard against any danger of lowering the academical standard, it is proposed to introduce a matriculation examination for all the students alike, and this plan is favoured by the ladies themselves, who are of course anxious that the degree of the only university open to them should not lose its relative or its positive value. Forty-four out of the fifty-one students are inscribed in the faculty of medicine; and a pamphlet by the physiologist Bischoff, who entertains a strong *à priori* objection to the study of medicine by women, has called forth an answer by his colleague, Prof. Bierner, who has had in all twenty women in his lectures, and speaks highly of the accuracy and penetration of the best amongst them. He adds: "Gerade in der Mikroskopie, einer wichtigen Seite der modernen Medicin, hat meiner Ueberzeugung nach das Weib eine Zukunft." As to the anticipated inconveniences of lecturing on anatomy, &c. before mixed classes, the professors are unanimous that none have arisen. The conduct of the young men has been irreproachable, and the serious zeal of the ladies has acted as a stimulus to the other students; the only difference made by their presence in the lectures is that the slightest facetiousness of tone has become impossible, and this sacrifice, if it can be so called, the professors make without reluctance. The experience of Zürich is important because Lord Gifford's interlocutor in the action brought by the lady students at Edinburgh against the senate and chancellor of that university may be considered to decide the case practically in favour of the former. The French universities, it is noticeable, show much less reluctance than those of Germany to the admission of female students.

M. Ganneau, whose name is so well known in connection with "the Moabite stone," has published in the *Revue archéologique* a list of Hebrew, Greek, and Latin inscriptions discovered by him in Palestine. Twelve of them are described as Hebrew inscriptions, including—No. 1, the Moabite stone; Nos. 2 and 3, inscriptions in Phœnician characters found at Silvân, and presented to the British Museum; Nos. 11 and 12, Greek inscriptions, with a single word in archaic Hebrew. There is also one in each of the following characters: hieroglyphic (found at Gaza), cuneiform (found at Salt), ancient Aramaic, Phœnician, Nabathean, Estrangelo, Pehlevi; also eight Latin and fifty-six Greek inscriptions. A large number of engraved stones, graffiti, texts of the Crusades, cufic and other inscriptions (not all found in Palestine) are not included in this catalogue. M. Ganneau is now in Paris.

With the publication of the twenty-first volume of *Kuhn's Zeitschrift*, a new series commences, under the same direction as the old. An index to the last ten volumes is in the press, and will appear in the course of the year.

Messrs. Teubner announce *Untersuchungen über das System Plato's*, by Dr. David Peipers; an *Anthologia Latina Epigraphica*, by Bücheler; an edition of Demosthenes' *de Corona*, by J. H. Lipsius; *Polemonis Declarationes*, by Hinck; and *Porphyrionis Commentarii in Horatium*, by W. Meyer.

In *Fraser's Magazine* for August, "Pronunciation of Latin," by D. F., supports the hard pronunciation of *c* and *g* by Celtic analogies, which are also used to explain the transition to the present Italian pronunciation, which is recommended for practical adoption.

Contents of the Journals.

Journal Asiatique, No. 70.—Essay on the two principal Aramean dialects, by M. l'abbé Martin. [The introduction explains the local distinction between the two dialects, which corresponds pretty nearly to the religious division between Nestorians on the one hand, and Jacobites, Maronites, and Melchites on the other. M. Martin then proceeds, on the basis of Bar-Bahlul, Jacob of Edessa, Bar-Hebraeus, &c., to examine, 1. phonetic questions, and 2. different parts of grammar; concluding with some remarks on Syriac lexicography. He expresses an unfavourable opinion as to the results to be obtained for the lexicon from publishing the works of Bar-Aly and Bar-Bahlul. Passages from manuscript authorities are given at the end of the number.]—Intelligence, and notice of the Appendix to Perny's *Chinese Dictionary*.

The Pandit, Vol. vii. No. 73 (June).—The *Śabdachintāmaṇi* (or fourth book of the *Tattva-chintāmaṇi*, a celebrated work on *Nyāya* philosophy), with Ruchidatta Miśra's comment. [Continued.]—The *Brahma-mīmāṃsā*, or *Vedānta* aphorisms, with Kaṇṭhaśivachārya's

comment. [Continued from the 19th aphorism of the 1st pāda of adhyāya I. to the end of the 2nd pāda.]—A *résumé* (*upasaṃhāra*), by Vāmanachārya, of the drama *Viddhaśālabhanjikā* of Rājasekhara.—The first portion of the *Karpūramanjari*, a *Saṭṭaka*, or dramatic composition in Prakrit dialect, by Rājasekhara. Edited, with a Sanskrit translation, by Vāmanachārya.—The *Videan-mano-ranjini*, or "Rejoicer of the Mind of the Learned," a commentary on Sadānanda's *Vedāntasāra*, by Rāmātirtha. Edited, with an English translation, by A. E. G. and G. D. [Continued.]—Catalogue of Benares Sanskrit MSS. [Continued. MSS. 5–10 of *Nyāya* and *Vaiśeṣika* works.]

Rheinisches Museum, vol. xxvii. pt. 3.—A. Holm: The Discoveries in the Great Temple at Selinus in the Spring of 1871. [With facsimile of an inscription.]—K. Dilthey: On the Greek Hymns published by E. Miller. [Discusses them in connection with the magic-papyri edited by Parthey, with remarks on the earlier literature of magic, and some emendations on the text.]—L. Ziegler: On the Text of the Scholiasta Bobiensis on Cicero's Orations. [A number of critical notes, the result of an accurate re-examination of the palimpsest.]—J. Gildemeister and F. Bücheler: Themistios *περί ἀρετῆς*. [A German translation of the Syriac version by which alone this valuable relic of antiquity has survived.]—H. Gelzer: Inscriptions in Asia Minor.—W. Schmitz: On the Tironian Notes.—Fr. Rühl: Corporare.—L. Müller: *In re Simonides*. [Prof. L. M., writing from St. Petersburg, informs us that the Russian officials know nothing of Simonides or his whereabouts.]—L. Müller: On Tacitus and Suetonius. [On a supposed surviving fragment of the *Fulda MS.*]—F. Bücheler: Coniectanea.—W. Clemm: *Oraculum Pythium*. [Proposes to emend the line *ἀ φιλοχρηματία Σάραρον ὀλεῖ, ἄλλο δὲ οὐδὲν*, by reading *ἄλλ' ὀλεῖ οὐδὲν*.]—N. Wecklein: On Euripides. [*Phœn.* 722 and 916.]—M. Schmidt: A Decade of Conjectures. [On Plato, Thucydides, &c.]—J. M. Stahl: On Thucyd. iv. 28.—W. Teuffel: On Plautus, *Trinumm.* 725.—L. Müller: On the poem *De Sodoma*. [An attack on Haupt.]—A. Riese: On Cato. [*Gell.* xi. 2.]—E. Baehrens: On Varro's *Saturae Menippeae*.—G. Krüger: On Cicero. [*Pro Sestio*, 6, 14 and 11, 26.]—A. Eussner: Coniecturae in Sallustii *Catilinam*.—M. Schmidt: On Hyginus.—Erotemata philologica, &c.

Zeitschrift für Deutsches Alterthum, iv. 1 (Berlin).—Steinmeyer: Glossen zu Prudentius (Old High German).—Wilmanns: Metrische Untersuchungen über die Sprache Otfried's. [Attempts to settle the quantities of the end-syllables by means of the rhymes and assonances.]—K. M.: Um Ragnaröckr. [The word is a late corruption of *ragna rök*, in which *rök* is equivalent to the Old E. *racu*, and signifies "fate," by an easy process of metaphor. The usual translation "Götterdämmerung" has, therefore, no foundation in the older mythology.]—K. M.: Uuara und Uuara. [Shows by a comparison with the Old High German forms that the separation of *wār* (foedus) and *wāru*, gen. *wāre* (Schutz), in Beowulf is wrong: both words should be written with the long vowel, corresponding to the O. H. G. *wāra*, which from the original sense of "truth" develops that of "fidelity" and finally "protection."]—iv. 2 (Halle).—K. Maurer: Zur Geschichte der Godenwürde. [Traces the origin and development of the Norwegian and Icelandic priesthood in heathen times.]—F. Koch: Englische Etymologien [*a-jar* from O. E. *cer* (turn), *awakward* from a conjectural O. E. *afoc* = Gothic *iŭks*, *big* from *būan* in the sense of "adorn," *bad* from *bedling* (effeminatus), *cushat* from a hypothetical *cwic-seote*, and some others of less importance].—Zu Lamprecht's *Alexander II.*, von J. Harczyk. [Comparison of the German poem with the earlier traditions.]—L. Meyer: Zur *Germania* des Tacitus, Schluss. [Criticisms on the explanations given of various passages.]—S. Bugge: Zum Beowulf. [Valuable emendations and explanations of the text; a continuation of earlier articles in the *Tidskrift för Philologi og Pædagogik*.]

New Publications.

BENFEY, Th. Ueber die Entstehung des indogerm. Vokativs. Göttingen: Dieterich.

DEVERIA, Th. Le papyrus de Neb-Qed, exemplaire hiéroglyphique du livre des morts, reproduit, décrit et précédé d'une introduction mythologique. Avec la traduction du Texte par Paul Pierret. Avec planches chromol. Paris: Franck.

EISENLOHR, A. Der grosse Papyrus Harris. (Vortrag.) Leipzig: Hinrichs.

QUICHERAT, L. Introduction à la Lecture de Nonius Marcellus. Paris: Hachette.

TEN JĀTAKAS. The Original Pali Text; with Translation and Notes. By V. Fausbøll. Trübner.

ERRATA IN No. 53.

Page 284 (b), 18th line from bottom, for "twelve" read "twenty-six."
" 299 (b), last line but one, for "conception" read "corruption."